

Appendix A

# **Revised Project Description**

## Chapter 2

# Project Description

### Project Goal

The goal of the Route 238 Corridor Improvement Project (proposed project) is to improve traffic conditions along Foothill Boulevard and Mission Boulevard between Interstate 580 (I-580) and Industrial Parkway.

### Project Objectives

The primary objectives of the project are as follows:

- Reduce traffic congestion in downtown Hayward and on Foothill Boulevard/Mission Boulevard;
- Improve traffic operations at the Mission Boulevard/Foothill Boulevard/Jackson Street intersection;
- Construct a facility that will accommodate current and future traffic demands as permitted by funding constraints;
- Improve access to the California State University campus in Hayward; and
- Be eligible for Measure B funding.

The secondary objectives of the project include the following:

- Provide for bicycle access along Mission Boulevard and Foothill Boulevard; and
- Improve pedestrian access in the downtown area.

### Project Description

The project is located along Foothill Boulevard and Mission Boulevard between ~~Mattox Road~~ the City limits and Industrial Parkway in the City of Hayward. Figure 2-1 depicts the regional project location and Figure 2-2 depicts the

specific project corridor. The project includes changes in circulation, changes in lane directions and controls, a downtown one-way loop street system, improvements to the Jackson Street/Watkins Street intersection, improvements to the Foothill Boulevard/Mission Boulevard/Jackson Street intersection, improvements to the Mission Boulevard/Carlos Bee Boulevard Intersection, improvements to the Foothill Boulevard/D Street intersection, improvements to the Jackson Street/Grand Street intersection, and other roadway improvements along Foothill Boulevard and Mission Boulevard.

For this project description, the project has been divided into three segments, which are shown in Figure 2-3 and are defined as follows:

- Segment A—~~Mattox Road~~ City limits to City Center Drive (South)
- Segment B—City Center Drive (South) to Fletcher Lane (includes ~~mini-loop and grade separations, as well as mini-loop, as well as,~~ improvements to the Jackson Street/Grand Street intersection)
- Segment C—Fletcher Lane to Industrial Parkway

Proposed improvements within the segment limits indicated above are shown below with a brief description of prominent features. Refer to Appendix B for ~~detailed,~~ preliminary layout and construction staging drawings of the proposed project improvements.

## Segment A

### ~~Mattox Road~~ City Limits to City Center Drive (South)

The existing Foothill Boulevard within this segment generally includes three (3) travel lanes in each direction and parking on both sides<sup>1</sup>. Within this segment, the west curb line and adjacent sidewalk will remain in place with all roadway modifications occurring on the east side with the exception of a portion of Foothill Boulevard between ~~Cotter Way and Kimball~~ Grove Way and Oakview Avenue, where the west curb will be moved further to the west and a new sidewalk will be constructed around a row of existing trees at the Summerwood Apartment complex. Additional right-of-way will be acquired from the latter to provide for the proposed sidewalk construction. All other proposed improvements will be constructed within existing rights-of-way. A feature within this section is the improvement of access to the existing freeway on-ramp system to I-580.

The following are descriptions of proposed improvements:

### Foothill Boulevard

<sup>1</sup> With the exception of restricted southbound parking between Mattox Road and Grove Way.

- Modify **Foothill Boulevard** to four (4) lanes in each direction, three lanes of which will be travel lanes at all times and one of which will be a travel lane during peak hours and parking during off-peak hours. A new curb and gutter with a 6-foot-wide sidewalk will be constructed along the east side of Foothill Boulevard and Boulevard. Between ~~between~~ Grove Way and Oakview Avenue, a new curb and gutter will also be constructed along the west side in order to preserve the existing median in this area. The new parking/peak hour lanes would be south of Grove Way (see Sheets 1, 2, and 3 in Appendix B1).

## Interstate 580

- At the **I-580** freeway on-ramp entrance, reconfigure the entrance to the existing ramps to allow for dedicated approaching lanes to the entrance ramps for eastbound and westbound I-580. This will include permanent removal of parking in order to create four (4) northbound lanes from Grove Way to the on-ramps. This will improve the ability of the public to access the freeway system (see Sheet 1 in Appendix B1).

## Apple Avenue

- Modify **Apple Avenue** (east side) between Foothill Boulevard and Oak Street to be one-way to the east (see Sheet 1 in Appendix B1).

## Segment B

### City Center Drive (South) to Fletcher Lane

Existing Foothill Boulevard within this segment generally includes three (3) travel lanes in each direction and parking on both sides. Existing Mission Boulevard from Foothill Boulevard to Fletcher Lane generally includes three (3) southbound travel lanes with parking and four (4) northbound travel lanes, of which two (2) are right - ~~Within this segment, the west curb line and adjacent sidewalk will remain in place up to A Street. All widening will occur within existing right-of-way. turn only lanes to northbound Foothill Boulevard.~~ North of Foothill Boulevard, Mission Boulevard generally includes two (2) travel lanes in each direction with parking on both sides. The predominant features in this section will be implementation of a mini-loop one-way street system within the downtown area (highlighted area), widening D Street between Foothill Boulevard and Watkins Street, the ~~construction of partial grade separations at the Foothill Boulevard/Mission Boulevard/Jackson Street and Jackson Street/Watkins Street intersections,~~ modification of the Foothill Boulevard / Mission Boulevard / Jackson Street intersection, and the improvements to the Jackson Street/Grand Street intersection (see Sheets 3-6 in Appendix B1). Additional right-of-way will be acquired for the Mission Boulevard / A Street intersection improvement;



widenings along D Street and Mission Boulevard, and the Foothill Boulevard / Mission Boulevard / Jackson Street intersection modification.

The following are descriptions of the proposed improvements.

## **Foothill Boulevard**

- Remove existing median islands, where needed, and construct new four (4) foot wide raised median islands north of **A Street** (see Sheet 4 in Appendix B1).
- Modify Foothill Boulevard to four (4) lanes in each direction ~~including parking/peak hour travel lanes~~ from **City Center Drive** (South) to **A Street**. New curb and gutter with a six (6)-foot sidewalk will be constructed along the east side of Foothill Boulevard (see Sheets 3 and 4 in Appendix B1).
- Remove traffic signal at **Russell Way** and Foothill Boulevard; ~~Remove left turn from southbound Foothill Boulevard to Russell Way; Restrict~~ movements to right-in/right-out at Russell Way (see Sheet 4 in Appendix B1).

Figures 2-4 and 2-5 depict some of the details of the proposed changes to Foothill Boulevard, including landscaping, sidewalk paving, light fixtures, and a traffic signal bridge.

## **Mini-loop**

- Convert **Foothill Boulevard** to a six (6) lane one-way northbound street between A Street and Mission Boulevard. The overall existing street width will be decreased to accommodate fourteen (14) foot sidewalks on both sides and to provide for a parking / bicycle lane on the east side north of D Street. Parking will be prohibited on the west side (see Sheets 4 and 5 in Appendix B1).
- Modify the **Foothill Boulevard/A Street intersection** to provide triple right turns from southbound Foothill Boulevard to westbound A Street. Provide a dedicated right-turn lane and thru/right lane starting mid-block between B Street and A Street from northbound Foothill Boulevard to eastbound A Street, and a dedicated left-turn lane to westbound A Street (see Sheet 4 in Appendix B1).
- Convert **A Street** to a five (5) lane one-way westbound street between Foothill Boulevard and Mission Boulevard. Provide triple left turns from westbound A Street to southbound Mission Boulevard. (see Sheets 4 and 6 in Appendix B1). ~~Mission Boulevard between A Street and D Street will accommodate a Class III bike route.~~
- Convert **Mission Boulevard** to a five (5) lane one-way southbound street between A Street and D Street; and six (6) lanes between D Street and Jackson Street. Provide ~~two thru lanes, a combined thru/right, and two four~~

(4) thru lanes and two (2) right-turn lanes at Jackson Street (see Sheets 5 and 6 in Appendix B1). Mission Boulevard between A Street and D Street will accommodate a Class III bike route.

- Convert **B Street** to a two-way street between Foothill Boulevard and Second Street (see Sheet 4 in Appendix B1).
- Eliminate dual left turns from westbound **D Street** to southbound Foothill Boulevard. Provide dual left-turn lanes from westbound D Street to southbound Mission Boulevard. Construct new curb and gutter with an 8-foot sidewalk along the south side of D Street from Foothill Boulevard to Watkins Street. D Street will also be widened to the north to accommodate triple left turns from eastbound D Street to northbound Foothill Boulevard and a single thru lane (see Sheets 5 and 6 in Appendix B1).
- ~~Close~~ Provide a right-turn-only access from northbound **Foothill Boulevard** to **Main Street** at Foothill Boulevard on the east side (see Sheet 5 in Appendix B1).
- Provide direct connection from Armstrong Street to Main Street to E Street. Reduce Close E Street south of Main Street for vehicular access while maintaining pedestrian access to one lane eastbound (see Sheet 5 in Appendix B1).

## **~~Grade Separation~~**

- ~~—Provide two traffic lanes along eastbound Jackson Street under Mission Boulevard and Watkins Street, with construction of a side access road along the south side to provide for overhead traffic on the latter streets remaining on top using overhead bridge structures (see Sheet 5 in Appendix B1).~~
- ~~—Retaining walls will be constructed on both sides of Foothill Boulevard Jackson Street (see Sheet 5 in Appendix B1).~~
- ~~—Three (3) lanes of westbound traffic along Jackson Street will be maintained at existing vertical grades (see Sheet 5 in Appendix B1).~~

## **Mission Boulevard**

- ~~Mission Boulevard will continue to provide~~ Provide three (3) northbound lanes to northbound **Foothill Boulevard** that will merge with three (3) northbound lanes from Jackson Street for a total of six (6) lanes on northbound Foothill Boulevard (see Sheets 5 and 7 in Appendix B1).
- ~~Three (3) lanes of southbound traffic will be maintained along~~ Close **E Street** at Mission Boulevard and vacate E Street between Mission Boulevard and Main Street while maintaining pedestrian access.
- Provide four (4) southbound lanes south of Jackson Street and reduce to three (3) lanes at the approach to **Fletcher Lane** (see Sheets 5 and 7 in Appendix B1).

- Provide pedestrian crosswalks on the south and east legs of the **Foothill Boulevard / Mission Boulevard / Jackson Street** intersection.
- Close **Willis Avenue** at Mission Boulevard and vacate Willis Avenue between Mission Boulevard and Francisco Street. Convert Willis ~~Street~~ Avenue from one-way westbound to two-way between Watkins Street and Francisco Street (see Sheets 5 and 6 in Appendix B1).
- Reconfigure the parking lot at the Kragen Auto Parts store and Ranch Restaurant site (see Sheet 5 in Appendix B1).
- Convert **Hotel Avenue** from two-way to one-way westbound between Mission Boulevard and Prospect Street.
- Convert **Simon Street** from two-way to one-way westbound between Mission Boulevard and just west of Prospect Street.

### **Jackson Street**

- Eliminate dual left turns from eastbound **Jackson Street** to northbound Mission Boulevard. Provide three (3) thru lanes from eastbound Jackson Street to northbound Foothill Boulevard.
- Reconstruct the **Jackson Street/Grand Street/Winton Avenue** intersections ~~to accommodate traffic detours during construction of the proposed grade separations.~~

## Segment C

### Fletcher Lane to Industrial Parkway

Existing Mission Boulevard within this segment generally includes two (2) travel lanes in each direction with parking on both sides except near Fletcher Lane where there are some parking/peak hour lanes. ~~Within the majority of this segment,~~ Between Fletcher Lane and Palisade Street improvements will remain within the existing right-of-way but the sidewalk area will be reduced to 7 feet on both sides to create parking/peak hour travel lanes. The most substantial widening improvements are at the Carlos Bee Boulevard/Mission Boulevard intersection.

Generally south of this intersection, the two (2) travel lanes in each direction that exist today will remain with parking. The sidewalks will be widened to 10 feet. Some parking restrictions will occur near the Harder Road and Tennyson Road intersections to allow for turning movements and lane transitions.

The following are descriptions of the proposed improvements.

### Mission Boulevard

- Modify **Mission Boulevard** from two (2) to three (3) travel lanes in each direction including parking/peak hour travel lanes from Fletcher Lane to Palisades Street. New curb and gutter with a 7-foot wide sidewalk will be constructed on both sides of Mission Boulevard (see Sheets 7-13 in Appendix B1. The peak hour travel lanes in the northbound and southbound directions will end at Palisade Street.
- Widen Mission Boulevard at **Carlos Bee Boulevard** intersection to provide ~~for three (3) thru lanes in each direction,~~ dual left-turn lanes from southbound Mission to eastbound Carlos Bee, a dedicated right turn lane from northbound Mission to eastbound Carlos Bee, dual left-turn lanes from westbound Carlos Bee to southbound Mission, a dedicated right turn lane from southbound Mission to westbound Orchard Avenue, a left turn lane from northbound Mission to westbound Orchard Avenue, and dual left-turn lanes, a thru lane, and right/thru lane from eastbound Orchard Avenue to northbound Mission (see Sheet 8 in Appendix B1).
- At the Mission Boulevard and **Harder Road** intersection, provide three (3) thru lanes and left turn lanes in each direction. To create the additional thru lanes, parking will be restricted north of the intersection for 600 feet and 200 feet along the east and west sides of Mission Boulevard respectively. AM peak hour only parking restrictions will be installed on the west side of Mission Boulevard from 200 feet to 600 feet north of the intersection. South of the intersection, parking will be restricted for 600 ft on both sides of the street.

- At the Mission Boulevard and **Tennyson Road** intersection provide for three (3) thru lanes in each direction, a single left turn from southbound Mission to eastbound Tennyson, dual left turns from northbound Mission to westbound Tennyson, and a dedicated right turn from southbound Mission to westbound Tennyson. North of the intersection, parking will be restricted 200 feet along the west side and 500 feet along the east side of Mission Boulevard. South of the intersection, parking will be restricted 400 feet along the east side of Mission Boulevard.
- ~~Extend~~ Reconstruct sidewalks and curb and gutter along **Mission Boulevard** on both sides of the ~~street-to-street~~; fill in missing sidewalk gaps to Industrial Parkway (see Sheets 7-13 in Appendix B1).
- Improve bicycle access along portions of **Mission Boulevard** by providing a 14-foot lane along the proposed outside curbs.
- Remaining overhead utilities along **Mission Boulevard** will be relocated underground.

Figures 2-6 and 2-7 depict some of the details of the proposed changes to Mission Boulevard, including median landscaping, sidewalk paving, and light fixtures.

## Central Boulevard

- Close **Central Boulevard** to Mission Boulevard by closing it at Belmont Avenue, but provide access to existing residences or businesses between Belmont Avenue and Mission Boulevard (see Sheet 8 in Appendix B1).

## Berry Avenue

- Extend **Berry Avenue** from west of Mission Boulevard directly east to Belmont Avenue and signalize the new full intersection at Berry Avenue / Mission Boulevard (see Sheet 8 in Appendix B1).
- Close existing **Berry Avenue** between Mission Boulevard and Belmont Avenue (see Sheet 8 in Appendix B1).

## Harder Road

- Reconstruct the median islands within **Harder Road** to provide for dual left turns to northbound and southbound Mission Boulevard (see Sheet 9 in Appendix B1).

## Jefferson Street

- Remove the signal and the southbound left-turn lane at **Jefferson Street**. Jefferson Street is to be converted to right-in, right-out movements only by constructing a ~~concrete barrier~~ raised median island along Mission Boulevard (see Sheet 11 in Appendix B1).

## Moreau Catholic High School

- Provide a southbound left-turn access into the existing Moreau High School driveway. Install a traffic signal to coordinate left turns into the driveway with traffic movements at the Calhoun intersection (see Sheet 11 in Appendix B1).

## Right-In, Right-Out Movements

- Convert Pinedale Court, ~~Kellogg Avenue, Broadway Street, Douglas Palisade Street, Devon Drive, Jefferson Street, Broadway Street, Webster Street, and Monticello Street~~ to right-in, right-out movements only by constructing a raised median island along Mission Boulevard (see Sheets 7, 11, and 12 in Appendix B1).
- The La Vista Quarry traffic signal will be removed and the intersection will be converted to a right-in, right-out movement as part of a separate project.
- Existing right-in and right-out movements at the **Torrano Avenue** (west leg), **Kellogg Avenue**, and **Douglas Street** intersection will remain in place.

## Valle Vista Avenue

- Conform to existing lanes and improvements at **Valle Vista Avenue** and signalize the intersection (see Sheet 12 in Appendix B1).

## State Right-of-Way Relinquishment

State rights-of-way within the project alignment include the following:

- State Route 238—Foothill Boulevard from ~~Mattox~~ I-580 on ramps to Mission Boulevard and Mission Boulevard from Foothill Boulevard to Industrial Parkway.
- State Route 185—Mission Boulevard from Foothill Boulevard/Jackson Street to A Street.
- State Route 92—Jackson Street from Mission Boulevard to Grand Street.

The City intends to seek relinquishment of these rights-of-way from the State prior to construction. Subject to approval by the State, the extent of State Route 238 relinquishment would be ~~that which is within the City limits, from I-580 on ramps to Industrial Parkway.~~ State Route 92 relinquishment would be from ~~Santa Clara~~ Watkins Street to State Route 185. State Route 185 will be relinquished ~~within the City limits, from A Street to State Route 92.~~ Relinquished rights-of-way from the State would become local streets under the jurisdiction of the City.

## Right-of-Way Acquisition and Building Removal

In order to implement the project, the City will need to acquire private land in several locations along the project alignment. Right-of-way requirements would include the demolition of ~~2019~~ buildings, partial acquisition of ~~1311~~ parcels, and full acquisition of 19 parcels, as shown in Table 2-1, below. The right-of-way acquisition and building takes are shown in Figures 2-8 through ~~2.11, 2.12,~~ and are labeled with the corresponding Assessor Parcel Numbers (APNs) in Table 2-1.

1 **Table 2-1.** Project Right-of-Way and Building Acquisition Requirements

Corresponding draft EIR Figure	APN	Full <del>Take</del> <u>Acquisition</u>	Partial <del>Take</del> <u>Acquisition</u>	Building Removal
Figure 2-8	428-0016-049-00		X	
Figure 2-9	428-0056-045-00	X		1
Figure 2-10	428-0066-081-00	X		1
Figure 2-10	428-0066-080-00	X		
Figure 2-10	428-0066-079-00	X		
Figure 2-10	428-0066-078-00	X		
Figure 2-10	428-0066-077-00	X		1
Figure 2-10	428-0066-076-00	X		1
Figure 2-10	428-0066-075-00	X		1
Figure 2-10	428-0066-074-00	X		1
Figure 2-10	428-0066-073-00	X		
Figure 2-10	428-0066-072-00	X		1
Figure 2-10	428-0081-032-02		X	
Figure 2-10	428-0081-060-03		X	
Figure 2-10	427-0001-030-00	X		
Figure 2-10	428-0081-043-00		X	
Figure 2-10	428-0081-040-00		X	
Figure 2-10	428-0066-083-02	X		
Figure 2-10	428-0066-063-04		X	1
<del>Figure 2-10</del>	<del>428-0066-046-00</del>		<del>X</del>	<del>4</del>
<del>Figure 2-10</del>	<del>428-0066-047-00</del>		<del>X</del>	
Figure 2-11	445-0150-059-00		X	
Figure 2-11	445-0150-058-01	X		1
Figure 2-11	445-0150-056-00		X	1
Figure 2-11	445-0150-055-00	X		2
Figure 2-11	445-0150-054-00	X		2
Figure 2-11	445-0150-053-00	X		1
Figure 2-11	445-0150-052-00		X	
Figure 2-11	445-0200-009-00	X		1
Figure 2-11	445-0200-012-01		X	1
Figure 2-11	445-0200-013-00		X	
Figure 2-12	445-0210-051-01	X		2
<b>Total</b>		<b>19</b>	<b><del>13</del> 11</b>	<b><del>20</del> 19</b>



- **D Street and Mission Boulevard.** Property will need to be acquired on ~~13~~ 10 parcels in order to facilitate two left-turn lanes from westbound D Street to southbound Mission Boulevard and to facilitate the grade separation overall. ~~Seven (7)~~ Six (6) buildings along D Street will need to be removed.
- **~~Grade Separation (Mission Boulevard/Foothill Boulevard/Jackson Street intersection).~~** Property will need to be acquired from approximately seven (7) parcels in the vicinity of this intersection to accommodate the proposed grade separation. One (1) building at the corner of northbound Mission Boulevard and northbound Foothill Boulevard will be removed. ~~A utility easement will be required from the Five Flags parcel.~~
- **Mission Boulevard/Carlos Bee Boulevard.** Property will need to be acquired on ten (10) parcels on the east side of Mission Boulevard in order to provide additional lanes north and south of this intersection. Nine (9) buildings will be displaced on these parcels.
- **Berry Avenue Extension.** Property will need to be acquired on one (1) parcel on the east side of Mission Boulevard in order to complete Berry Avenue through to Belmont Avenue. Two (2) buildings will need to be removed to facilitate the project. Central Boulevard and Berry Avenue will be closed on the east side of Mission Boulevard. This public right-of-way would be returned to the underlying owners.
- **A Street and Mission Boulevard.** Although the engineering plans are not yet finalized, the proposed project may require the possible acquisition/removal of one (1) building at the southeast corner of A Street and Mission Boulevard, currently occupied by Zorn's Restaurant, former Zorn's building that is now vacant, to accommodate the necessary turning radius for large trucks. For the purposes of this EIR and to analyze a worst-case scenario, it is assumed that this building would be removed as part of the proposed project.

## Construction Timing and Phasing

Construction is now estimated to take approximately ~~four years~~ thirty (30) months to complete. Construction will be staged in ~~five phases over a 48-month period~~ three stages to minimize impacts on traffic and access restrictions to businesses during the construction period. Stage 1 involves the improvements along Foothill Boulevard from Apple Avenue to A Street. Stage 2 comprises the stretch between A Street and Fletcher Lane, including the one-way loop. Stage 3 includes the improvements on Mission Boulevard south of Fletcher Lane. Preliminary engineering plans of construction staging are available in Appendix B2 of this ~~DEIR~~ FEIR.

Construction will be phased in the following sequence:

**Phase Stage 1** would last approximately ~~18-6~~ months and would involve the following:

- Temporary lane closures during off-peak hour on ~~Mission Boulevard (between Foothill Boulevard and Industrial Parkway) and on Foothill Boulevard (between Apple Avenue and Mission Boulevard)-A Street~~ while sidewalks, medians, curbs, and utilities are constructed, reconstructed, and/or relocated.
  - ~~Temporary lane closures during off-peak hours on Mission Boulevard at Berry Avenue while Berry Avenue is realigned.~~
  - ~~Closure of left turn access into and out of Central Boulevard at Mission Boulevard (this would be a permanent closure). Existing sidewalks will be removed and reconstructed to a reduced width of 7 feet on the east side of Foothill Boulevard. Similar work will be done on the west side between Grove Way and Oakview Avenue.~~
  - Conversion of Apple Avenue, east of Foothill Boulevard to one-way operation (this would be permanent).
  - ~~Temporary lane closures during off-peak hours on D Street between Watkins Street and Foothill Boulevard while D Street is widened.~~
  - ~~Temporary lane closures during off-peak hours on Mission Boulevard, Foothill Boulevard, and Jackson Street while utilities at that intersection are relocated. Similar temporary off-peak lane closures on Jackson Street at Watkins Street for utility relocations.~~
  - The median break on Foothill Boulevard at Russell Way would be closed permanently.
  - ~~Main Street, south of Foothill Boulevard, would be permanently closed.~~
  - ~~The following median breaks on Mission Boulevard would be closed permanently at this stage: Pinedale Court, Palisade Street, Torrano Avenue (only leg on west side of Mission Boulevard), Devon Drive, Kellogg Avenue, Broadway Street, Webster Street, and Monticello Street.~~
  - ~~Central Boulevard at Mission Boulevard would be permanently closed.~~
  - ~~Berry Avenue, east of Mission Boulevard, would be permanently relocated.~~
- Phase Stage 2** would last approximately ~~6 months, overlapping with Phase 1,~~ and would involve the following: 12 months, and is further divided into four phases:
- Stage 2A:**
- Existing sidewalks will be removed and reconstructed to an increased width of 14 feet on Foothill Boulevard between A Street and D Street.
  - Buildings along D Street will be removed and the street will be widened to the south.
  - Access to Main Street from Foothill Boulevard will be permanently limited to a right-in only movement from northbound Foothill Boulevard. Northbound Foothill will be widening to the east to accommodate this movement.

- The northwest corner of the Foothill Boulevard / Mission Boulevard / Jackson Street intersection will be widened; the Kragen parking lot will be improved; and Willis Avenue will be vacated between Francisco Street and Mission Boulevard.
- Mission Boulevard will be widened easterly between D Street and Foothill Boulevard.
- The median island along Jackson Street will be removed and reconstructed between east of the UPRR tracks and Mission Boulevard.
- Temporary lane closures during off-peak hours on Foothill Boulevard (A Street to Mission Boulevard), Mission Boulevard (D Street to Fletcher Lane), on D Street (Watkins Street to Foothill Boulevard) while crews construct additional pavement, sidewalks, and utility relocations.

### Stage 2B:

- The south-east corner of the Mission Boulevard / A Street intersection will be widening by removing the corner building.
- Temporary lane closures during off-peak hours on Foothill Boulevard (A Street to Mission Boulevard), Mission Boulevard (A Street to Foothill Boulevard), ~~and~~ on A Street (Mission Boulevard to Foothill Boulevard) while crews install new signal poles and mast arms, signal heads, new signs, new lane striping necessary to convert the sections of these streets to one-way operation.
- Temporary lane closures during off-peak periods at the intersection of Jackson Street with Grand Avenue and Winton Avenue while this intersection is improved ~~to facilitate later stage detour movements.~~
- ~~■ Closure of several movements at intersection of Mission Boulevard, Foothill Boulevard, and Jackson Street, specifically: eastbound Jackson Street left to Mission Boulevard; and eastbound Jackson Street through to Foothill Boulevard.~~
- ~~■ Eastbound traffic on Jackson Street continuing north on Foothill Boulevard will be detoured (on a 24-hour basis) from Jackson Street at Grand Street to D Street to Foothill Boulevard.~~
- ~~■ Eastbound Jackson Street will be reduced to a single lane, east of Grand Street, up to Watkins Street. It will be temporarily closed east of Watkins Street until the grade separations are fully constructed.~~
- Closure of eastbound Jackson Street left-turn movement to Mission Boulevard.
- Permanently convert B Street to two-way traffic between Foothill Boulevard and Second Street.
- Implement one-way operations for A Street, Mission Boulevard, and Foothill Boulevard within downtown area.

**Phase 3** would last approximately 18 months and would involve the following:

- ~~Temporary, 24 hours a day closure of eastbound Jackson Street north of Watkins Street.~~
- ~~Eastbound traffic on Jackson Street will be detoured (24 hours a day) from Jackson Street at Grand Street to D Street to Foothill Boulevard.~~
- ~~Eastbound Jackson Street will be reduced to a single lane, east of Grand Street.~~
- ~~Temporary, 24 hours a day closure of one lane on northbound Foothill Boulevard between Mission Boulevard and D Street.~~
- ~~Temporary, 24 hours a day closure of one lane westbound Jackson Street between BART crossing and Mission Boulevard.~~

**Stage 2C:**

- Medians along Foothill Boulevard (between D Street and Mission Boulevard) and Mission Boulevard (between Foothill Boulevard and Fletcher Lane) will be constructed. Median islands at the Foothill Boulevard / Mission Boulevard / Jackson Street intersection will be constructed.
- Temporary lane closures during off-peak hours on Foothill Boulevard (D Street to Mission Boulevard) and Mission Boulevard (D Street to Fletcher Lane), while constructing the median islands and placing landscaping.

**Stage 2D:**

- Temporary lane closures during off-peak periods along D Street between Watkins street and Foothill Boulevard; on Foothill Boulevard at A Street and D Street, and on Jackson Street at Mission Boulevard while remaining median and sidewalk work is completed.
- Detour eastbound Jackson Street to southbound Mission Boulevard traffic through southbound Watkins Street and northbound Fletcher Lane during the construction of the median island and sidewalk along the south side of Jackson Street.

**Phase 4 Stage 3** would last approximately 12 months and would involve the following:

- Mission Boulevard will be widened easterly in the vicinity of the Carlos Bee intersection including acquiring right of way.
- Sidewalks and medians will be reconstructed, utilities relocated, and landscaping elements installed on Mission Boulevard (between Fletcher Lane and Industrial Parkway) using temporary lane closures during off-peak hours.
- Temporary lane closures during off-peak hours on Mission Boulevard at Berry Avenue while Berry Avenue is realigned.

- Permanent closure of left turn access into and out of Central Boulevard at Mission Boulevard.
  - The following median breaks on Mission Boulevard would be closed permanently at this stage: Pinedale Court, Palisade Street, Devon Drive, Broadway Street, Webster Street, and Monticello Street.
  - Central Boulevard at Mission Boulevard would be permanently closed.
  - Berry Avenue, east of Mission Boulevard, would be permanently relocated.
  - ~~Temporary, 24 hours a day closure of northbound Watkins Street between Fletcher Lane and Jackson Street. Southbound Watkins Street traffic will be required to turn right onto Jackson Street.~~
  - ~~Northbound traffic on Mission Boulevard wishing to turn left onto Jackson Street will be detoured (on a 24-hour basis) starting from Mission Boulevard at Orchard Avenue to Soto Road and left onto Jackson Street.~~
  - ~~Continue detour of eastbound traffic on Jackson Street (24 hours a day) from Jackson Street at Grand Street to D Street to Foothill Boulevard.~~
- ~~Phase 5 would overlap with Phase 4 for 1 month and would involve the following:~~
- ~~Eastbound Jackson traffic will be routed through the newly constructed grade separation.~~
  - ~~Temporary lane closures during off peak periods along D Street between Watkins Street and Foothill Boulevard; on Foothill Boulevard at A Street and D Street while remaining median island work is completed.~~

## Traffic Management Plan

~~A conceptual construction traffic management plan has been developed to accommodate traffic during construction.~~

~~This plan describes how traffic will be handled during the separate phases of construction.~~

- ~~Detours. Two (2) major movements are expected to be detoured for an extended period of time during the construction of the grade separations. Beginning at Phase 2, eastbound Jackson Street to northbound Foothill Boulevard traffic will be detoured along Jackson Street to Grand Street to D Street to Foothill Boulevard. In order to facilitate this movement, the Jackson/Grand/Winton intersection will be reconstructed. One (1) existing movement is expected to be detoured during the construction of sidewalk and median island on Jackson Street at Mission Boulevard. During Stage 2D, eastbound Jackson Street to southbound Mission Boulevard traffic will be detoured along Jackson Street to Watkins Street to Fletcher Lane to Mission~~

Boulevard. ~~The second major movement is northbound Mission Boulevard traffic to westbound Fletcher Lane to northbound Watkins Street and finally to westbound Jackson Street. During Phase 4, northbound Mission Boulevard traffic will be detoured to westbound Orchard Avenue to westbound Soto Road to then to westbound Jackson Street.~~

- ~~Lane Closures.~~ ~~During Phase 1, temporary lane closures in each direction are expected. The closures will be limited to off-peak hours and will be restricted to the immediate areas of construction. During Phases 3 and 4, one (1) lane along westbound Jackson Street will be closed. In addition, one (1) lane along northbound Foothill Boulevard between Mission Boulevard and D Street will be closed.~~ During all stages, temporary lane closures in each direction are expected. The closures will be limited to off-peak hours and will be restricted to the immediate areas of construction.
- *Alternative access.* Businesses that have frontage along Foothill Boulevard, Mission Boulevard, and Jackson Street will be affected as the proposed improvements are constructed. The Contractor will be required to construct temporary improvements to maintain access to business entrances and driveways throughout the construction period. A public information program will be required to ensure that proper noticing to the businesses are maintained in the event that business access will need to be closed for construction of certain improvements.
- *Parking Plan.* There will be a temporary reduction in available on-street parking during project construction. ~~The construction widening of Mission Boulevard and Foothill Boulevard is expected to happen in multiple phases.~~ During each phase, parking will be prohibited in the immediate vicinity. As construction progresses, the already-constructed area will become available for on-street parking. As a result, although people will experience inconvenience due to temporary parking loss, the loss will be relatively short in duration.

## Construction Traffic

A rough estimate of the construction traffic has been prepared in order to describe construction period traffic effects.

- Truck routing—Fill material would be obtained from sources in Hayward, Fremont, and Oakland. Trucks would use I-880 and SR 92 from the Hayward and Fremont sources. From Oakland the haul route would follow I-880 to A Street or I-880 to I-238 to Mission Boulevard.

## Construction Excavation

~~The project will require~~ Roadway excavations will occur in the following locations:

- ~~Grade Separation—37,000 cubic yards~~

- Mission Boulevard/Carlos Bee Boulevard Intersection—6,000 cubic yards
- Berry Lane Extension—1,000 cubic yards
- D Street— 2,560 cubic yards

Soil excavated will either be reused on site or hauled off-site to an appropriate reuse or disposal facility.

## Conceptual Cost Estimate

The preparation of a conceptual cost estimate for the project included developing a listing of construction items and corresponding quantities for not only the roadway improvements, but also included an analysis of utility impacts and right-of-way needs to support the overall project cost development.

Costs for the relocation of sewer, water, and storm drain facilities were included. ~~A major utility cost included installation of a new pumping plant at the northeast corner of the Mission Boulevard/Foothill Boulevard junction.~~ Utility relocation costs for private utilities, i.e., PG&E (electric and gas), AT&T (telephone), and Cable TV facilities, were assumed to be fully paid for by the various utility purveyors assuming that they are under franchise agreements. Undergrounding of utilities on Mission Boulevard would be funded separately through Rule 20a funds.

Right-of-way needs for the project underwent conceptual appraisal evaluations to estimate costs associated with not only acquisitions of partial and full parcels, but also to account for goodwill, fixtures and equipment, relocation assistance, and other associated right-of-way costs based on the type of business that was going to be impacted. Roadway and structure costs were developed using the latest procedures and standards established by the California Department of Transportation (Caltrans).

Typical contingencies for estimating construction costs have been applied. Soft costs have been included to account for:

- Preliminary and final design;
- Environmental documentation;
- Right-of-way engineering, acquisition, negotiations, and legal fees; and
- Construction administration, engineering, inspections, surveying, and testing.

Table 2-2 below presents a segment-by-segment cost summary for the items described above.

**Table 2-2. Estimated Cost Summary for Proposed Project (Dollars)**

Project Item	Segment A	Segment B	Segment C	Total Cost (Rounded)
Roadway Construction	<u>6,310,000</u> <u>5,446,000</u>	<u>23,763,000</u> <u>21,848,000</u>	<u>23,154,000</u> <u>29,919,000</u>	<u>53,200,000</u> <u>57,200,000</u>
Utility Relocations	<u>425,813</u> <u>259,000</u>	<u>1,750,000</u> <u>216,000</u>	<u>2,811,396</u> <u>406,000</u>	<u>5,000,000</u> <u>900,000</u>
Bridge Structures	0	845,000	0	800,000
Right-of-Way	<u>0</u> <u>61,000</u>	<u>4,816,000</u> <u>14,688,000</u>	<u>7,780,000</u> <u>11,813,000</u>	<u>12,600,000</u> <u>26,600,000</u>
Support Costs <sup>1</sup>	<u>2,054,423</u> <u>1,426,000</u>	<u>8,207,750</u> <u>5,516,000</u>	<u>8,191,745</u> <u>7,581,000</u>	<u>18,400,000</u> <u>14,500,000</u>
Total (2007 Dollars)	<u>8,790,235</u> <u>7,192,000</u>	<u>39,381,750</u> <u>42,268,000</u>	<u>41,937,141</u> <u>49,719,000</u>	<u>90,000,000</u> <u>99,000,000</u>
Construction Cost Escalation <sup>2</sup>	<u>669,000</u>	<u>2,586,000</u>	<u>3,555,000</u>	<u>6,800,000</u>
Right of Way Escalation <sup>3</sup>	<u>12,000</u>	<u>2,949,000</u>	<u>2,372,000</u>	<u>5,300,000</u>
Total (2011 Dollars)	<u>7,873,000</u>	<u>47,803,000</u>	<u>55,646,000</u>	<u>111,000,000</u>

## Notes:

1. Support Costs have not been escalated.

2. Escalation of September 2007 to June 2011 (45 Months) dollars using 3.0% annual rate.

3. Escalation of September 2007 to June 2011 (45 Months) dollars using 5.0% annual rate.

The cost figures are based on ~~2004~~2007 unit prices. Escalation of ~~these~~ construction and right of way costs ~~will be~~ have been considered ~~in the future~~ depending. Future escalations will be dependent on when right of way is acquired and when the project improvements would be constructed.

## Required Permits and Approvals

The following permits and other approval may be necessary for the project:

- **Caltrans.** As noted above, the City is pursuing the relinquishment of state Rights-of-Way within the project alignment. With relinquishment, the City need not pursue approval of Caltrans for improvements within these roadways. Caltrans will retain the Rights-of-Way for the on-ramp from Foothill Boulevard northbound to I-580 eastbound. In this area and any other portion of the right-of-way retained by Caltrans within the project alignment, the City will seek to conduct the project improvements under an encroachment permit process.
- **East Bay Municipal Utility District.** EBMUD has utilities within the project area that might be affected by the project. The City will need to work with EBMUD for protection and/or relocation of EBMUD infrastructure.



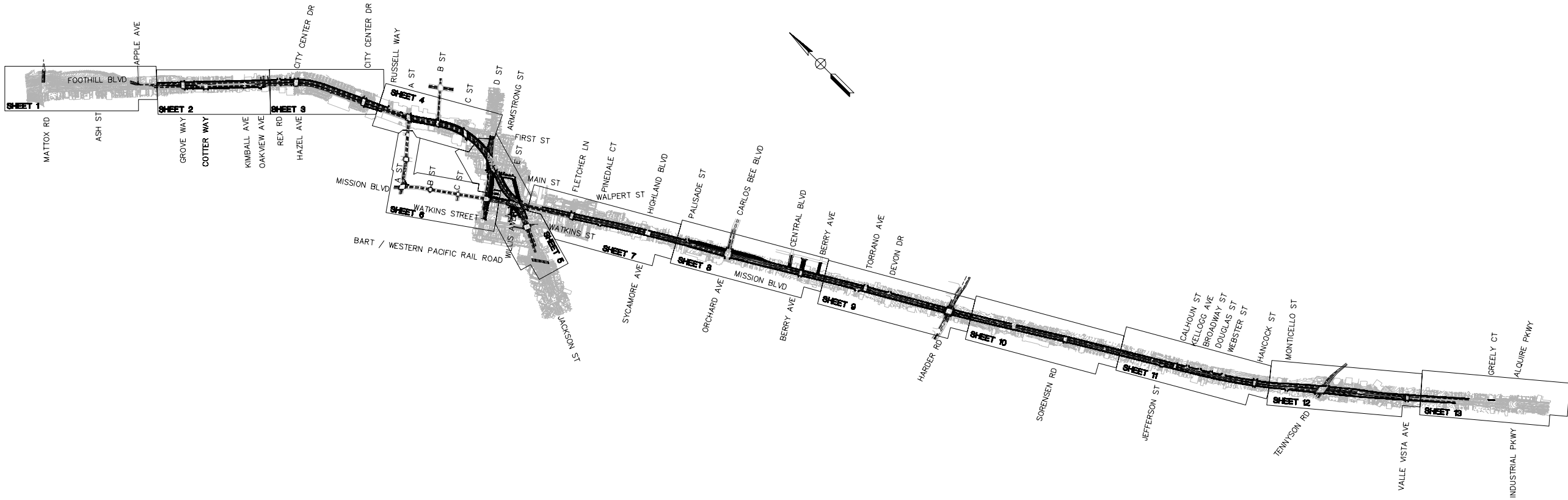
- 1                   ■ **San Francisco Bay Regional Water Quality Control Board.** The project  
2                   will require preparation of a Stormwater Pollution Prevention Plan (SWPPP)  
3                   in accordance with Section 402 of the Clean Water Act for construction. The  
4                   project would be required to meet all conditions of the Alameda County  
5                   Clean Water Program's NPDES permit (except Provision C.3 requirements)  
6                   as stated in the ACCWP Stormwater Quality Management Plan.
- 7                   ■ **Alameda County Flood Control District.** Several ACFCD facilities are  
8                   within the project alignment. Encroachment permits may be required in  
9                   certain circumstances.

Appendix B


# **Revised Layout and Construction Staging Plans**

Appendix B1


## **Revised Layout Plans**



ROUTE 238  
CORRIDOR IMPROVEMENT PROJECT  
PRELIMINARY GEOMETRIC LAYOUT

**MARK THOMAS & COMPANY, INC.**  
Providing Engineering, Surveying, and Planning Services  
1860 ZAVENIER ROAD  
SAN JOSE, CA 95132 (408) 453-5373

REGISTERED CIVIL ENGINEER



PLANS APPROVAL DATE

JOB NO. 55-0326B

SHEET INDEX of 13

DESIGNED BY AZ

CHKD BY JWS

DATE 8/20/07

SCALE NO SCALE

**LEGEND:**

- New Sidewalk
- New Pavement
- Street Abandonment
- Demolish Building
- Reconstruct Median
- Proposed Right-of-Way
- Existing Right-of-Way
- City Limits

**ABBREVIATIONS**

- S/W Sidewalk
- DWY Driveway
- PHL Peak Hour Lane
- ETW Edge of Traveled Way
- EP Edge of Pavement

ALAMEDA COUNTY  
CITY OF HAYWARD

FOOTHILL MEDICAL BLDG

CROSSWAY CHURCH

HAYWARD GLASS

NUDE FURNITURE WAREHOUSE

APPLE AVE

254+00

255+00

256+00

257+00

258+00

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ROUTE 238  
CORRIDOR IMPROVEMENT PROJECT  
PRELIMINARY GEOMETRIC LAYOUT

**MARK THOMAS & COMPANY, INC.**  
Providing Engineering, Surveying, and Planning Services  
1860 ZAVENIER ROAD  
SAN JOSE, CA 95132 (408) 453-5373

REGISTERED CIVIL ENGINEER



PLANS APPROVAL DATE

JOB NO. 55-0326B

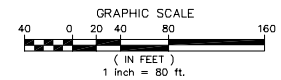
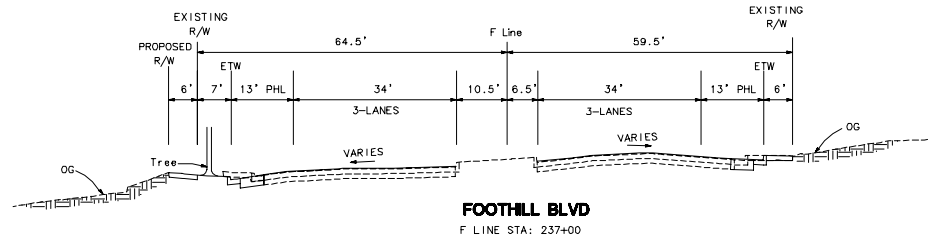
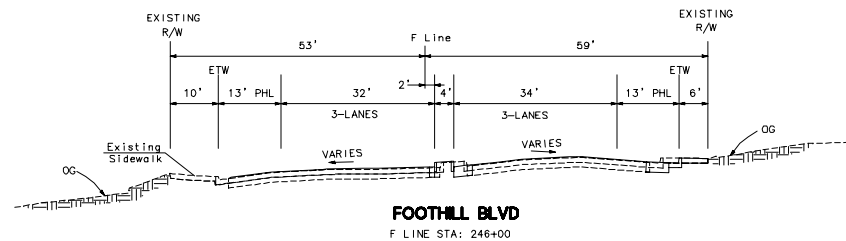
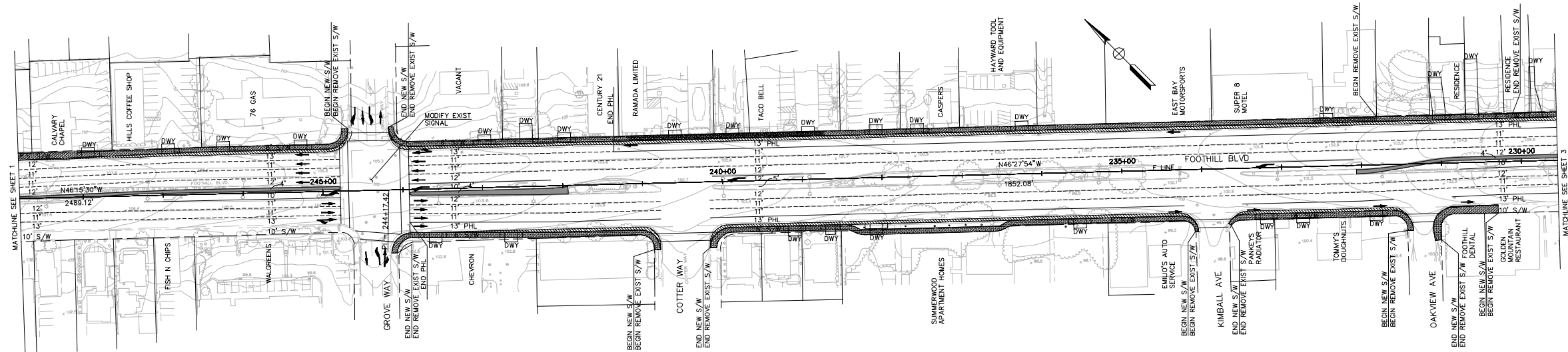
SHEET 1 of 13

DESIGNED BY AZ

CHKD BY JWS

DATE 8/20/07

SCALE 1" = 80'



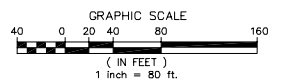
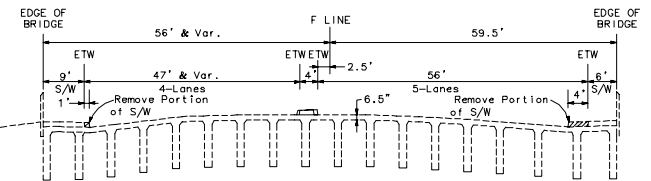
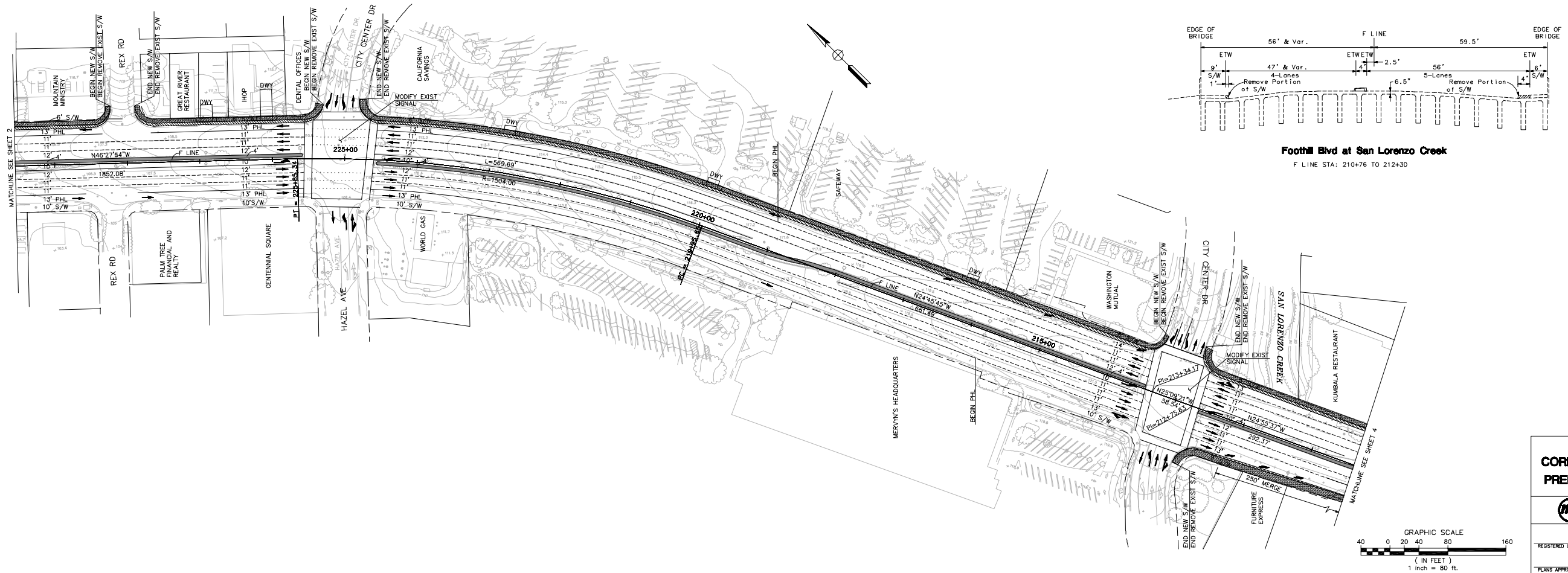
**ROUTE 238**  
**CORRIDOR IMPROVEMENT PROJECT**  
**PRELIMINARY GEOMETRIC LAYOUT**

**MARK THOMAS & COMPANY, INC.**  
1800 ZANKEER ROAD  
SAN JOSE, CA 95132 (408) 453-5373

REGISTERED CIVIL ENGINEER

PLANS APPROVAL DATE

JOB NO. 55-0326B  
SHEET 2 OF 13  
DESIGNED BY AZ  
CHKD BY JWS  
DATE 8/20/07  
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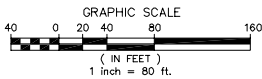
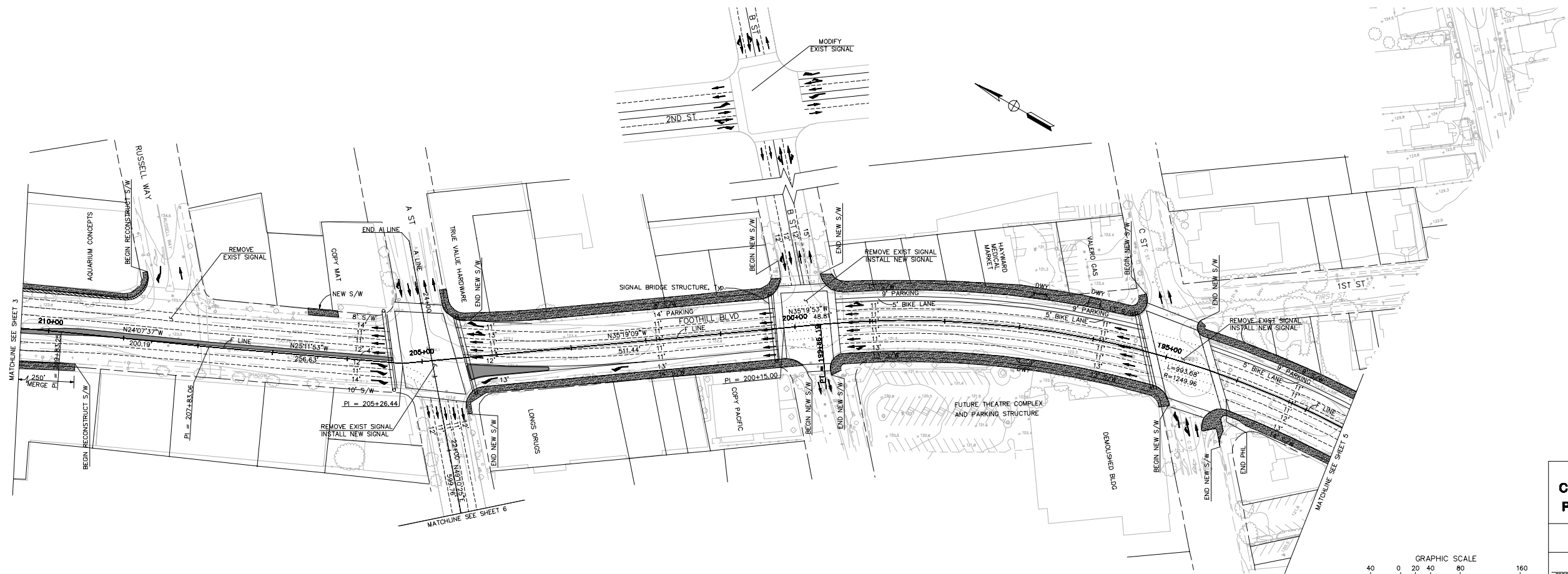
**ROUTE 238**  
**CORRIDOR IMPROVEMENT PROJECT**  
**PRELIMINARY GEOMETRIC LAYOUT**

**MARK THOMAS & COMPANY, INC.**  
1800 ZANKEER ROAD  
SAN JOSE, CA 95132 (408) 453-5373

REGISTERED CIVIL ENGINEER

PLANS APPROVAL DATE

JOB NO. 55-0326B  
SHEET 3 OF 13  
DESIGNED BY AZ  
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DATE 8/20/07  
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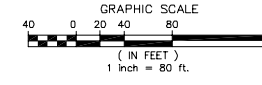
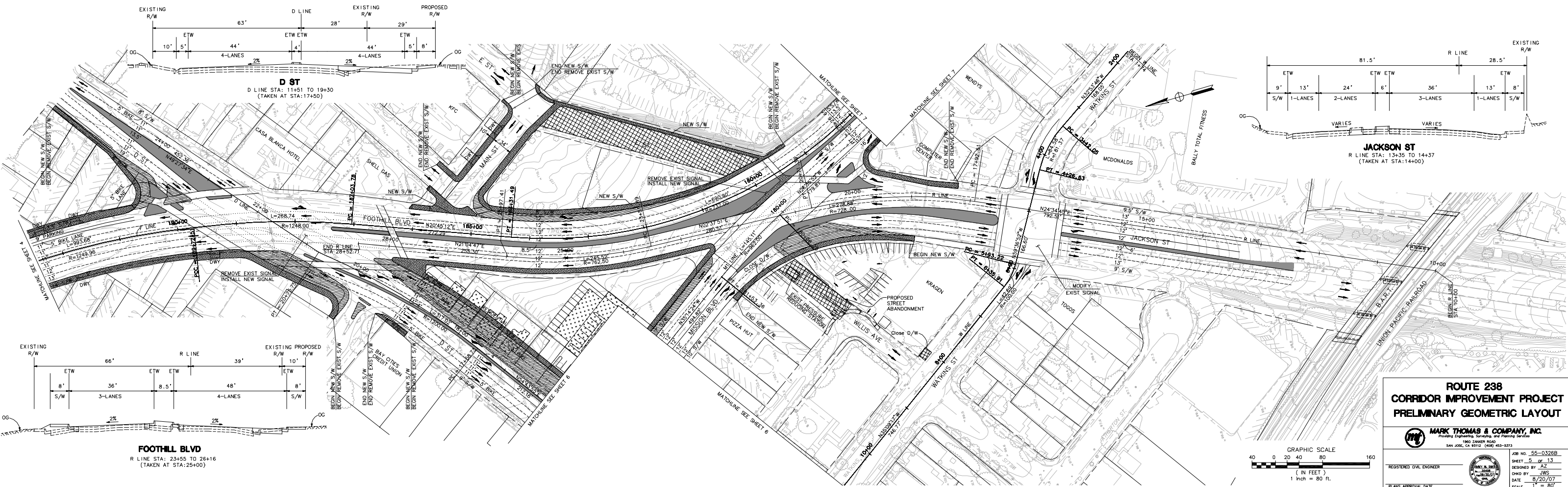
**ROUTE 238  
CORRIDOR IMPROVEMENT PROJECT  
PRELIMINARY GEOMETRIC LAYOUT**

**MARK THOMAS & COMPANY, INC.**  
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1800 ZANKEER ROAD  
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REGISTERED CIVIL ENGINEER

PLANS APPROVAL DATE

JOB NO. 55-0326B  
SHEET 4 OF 13  
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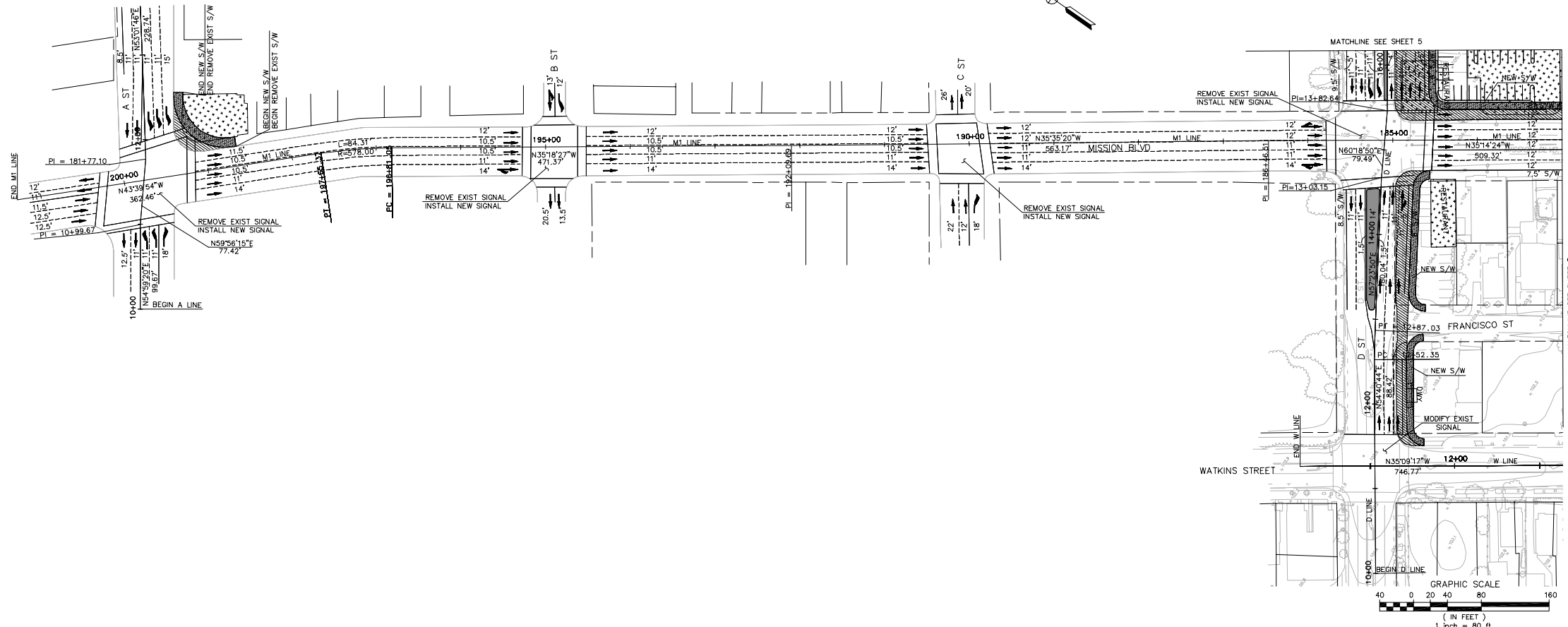
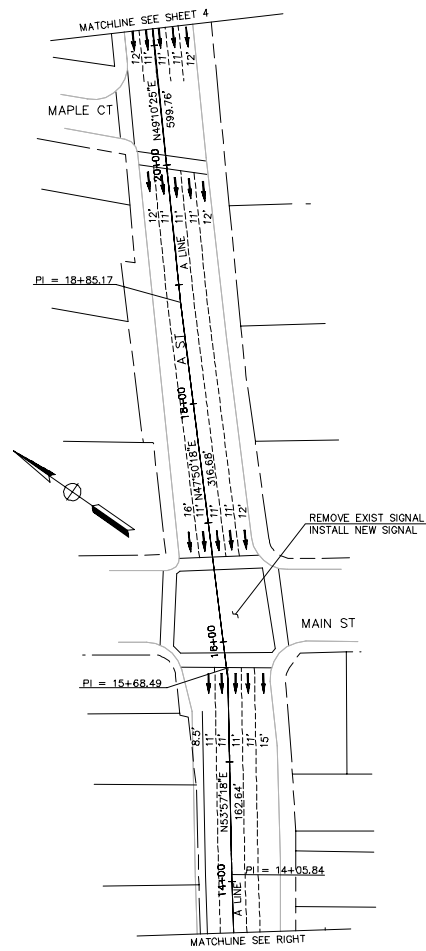
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Providing Engineering, Consulting, and Planning Services  
1800 ZANKEER ROAD  
SAN JOSE, CA 95128 (408) 453-5373

REGISTERED CIVIL ENGINEER

PLANS APPROVAL DATE

JOB NO. 55-0326B  
SHEET 5 OF 13  
DESIGNED BY AZ  
CHKD BY JWS  
DATE 8/20/07  
SCALE 1" = 80'



ROUTE 238  
CORRIDOR IMPROVEMENT PROJECT  
PRELIMINARY GEOMETRIC LAYOUT

MARK THOMAS & COMPANY, INC.  
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SAN JOSE, CA 95131 (408) 453-5373

REGISTERED CIVIL ENGINEER

PLANS APPROVAL DATE

JOB NO. 55-0326B  
SHEET 6 OF 13  
DESIGNED BY AZ  
DRAWN BY JWS  
DATE 8/20/07  
SCALE 1"=80'

Mission Blvd  
M LINE STA: 160+80 TO 165+66  
(TAKEN AT STA: 162+00)

ROUTE 238  
CORRIDOR IMPROVEMENT PROJECT  
PRELIMINARY GEOMETRIC LAYOUT

MARK THOMAS & COMPANY, INC.  
Providing Engineering, Surveying, and Planning Services  
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SAN JOSE, CA 95131 (408) 453-5373

REGISTERED CIVIL ENGINEER

PLANS APPROVAL DATE

JOB NO. 55-0326B  
SHEET 7 OF 13  
DESIGNED BY AZ  
DRAWN BY JWS  
DATE 8/20/07  
SCALE 1"=80'







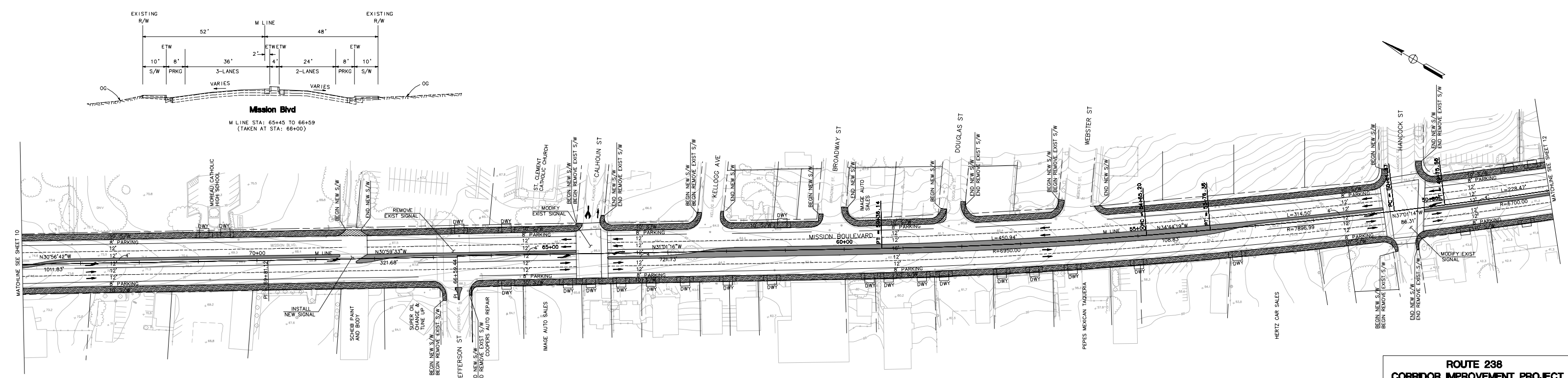


**ROUTE 238**  
**CORRIDOR IMPROVEMENT PROJECT**  
**PRELIMINARY GEOMETRIC LAYOUT**

**MARK THOMAS & COMPANY, INC.**  
Providing Engineering, Surveying, and Planning Services  
1800 ZANKER ROAD  
SAN JOSE, CA 95131 (408) 453-5373

REGISTERED CIVIL ENGINEER  
PLANS APPROVAL DATE

JOB NO. 55-0326B  
SHEET 10 OF 13  
DESIGNED BY AZ  
CHKD BY JWS  
DATE 8/20/07  
SCALE 1"=80'



**ROUTE 238**  
**CORRIDOR IMPROVEMENT PROJECT**  
**PRELIMINARY GEOMETRIC LAYOUT**

**MARK THOMAS & COMPANY, INC.**  
Providing Engineering, Surveying, and Planning Services  
1800 ZANKER ROAD  
SAN JOSE, CA 95131 (408) 453-5373

REGISTERED CIVIL ENGINEER  
PLANS APPROVAL DATE

JOB NO. 55-0326B  
SHEET 11 OF 13  
DESIGNED BY AZ  
CHKD BY JWS  
DATE 8/20/07  
SCALE 1"=80'



Appendix B2

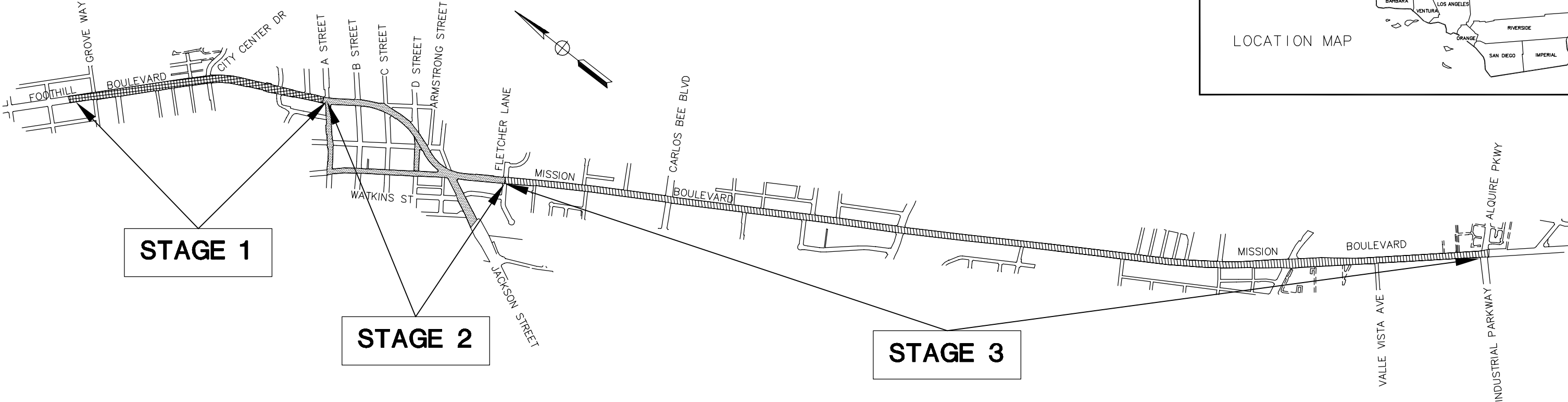
# **Revised Construction Staging Plans**

CITY OF HAYWARD

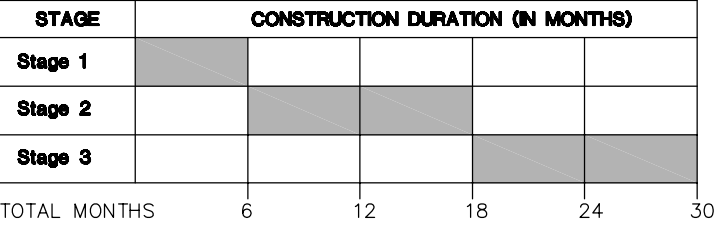
PRELIMINARY CONSTRUCTION STAGING PLANS FOR THE

ROUTE 238 CORRIDOR IMPROVEMENT PROJECT


IN THE CITY OF HAYWARD, CALIFORNIA



STAGE CONSTRUCTION DESCRIPTION					
STAGE		LIMITS	MAJOR WORK ITEMS	DURATION (MONTHS)	
STAGE 1		FOOTHILL BLVD (APPLE AVE TO A ST)	CONSTRUCT CURBS, SIDEWALKS, AND MEDIANS	6	
STAGE 2	2A	FOOTHILL BLVD (A ST TO MISSION BLVD) MISSION BLVD (A ST TO FLETCHER LN) JACKSON ST A ST	CONSTRUCT CURBS, SIDEWALKS, AND MEDIANS; WIDEN D ST; WIDEN MISSION BLVD; CONSTRUCT PORTION OF JACKSON ST MEDIANS	12	
	2B		IMPLEMENT LOOP SYSTEM; IMPROVE JACKSON/GRAND/WINTON INTERSECTION		
	2C		CONSTRUCT PORTION OF MEDIANS ON FOOTHILL BLVD, MISSION BLVD, AND JACKSON ST		
	2D		COMPLETE MEDIANS AND SIDEWALK ON JACKSON ST; CONSTRUCT D ST MEDIAN; CONSTRUCT FOOTHILL BLVD MEDIAN AT A ST		
STAGE 3		MISSION BLVD (A ST TO FLETCHER LN)	CONSTRUCT CURBS, SIDEWALKS, AND MEDIANS; IMPROVE CARLOS BEE BLVD INTERSECTION	12	
				TOTAL	30

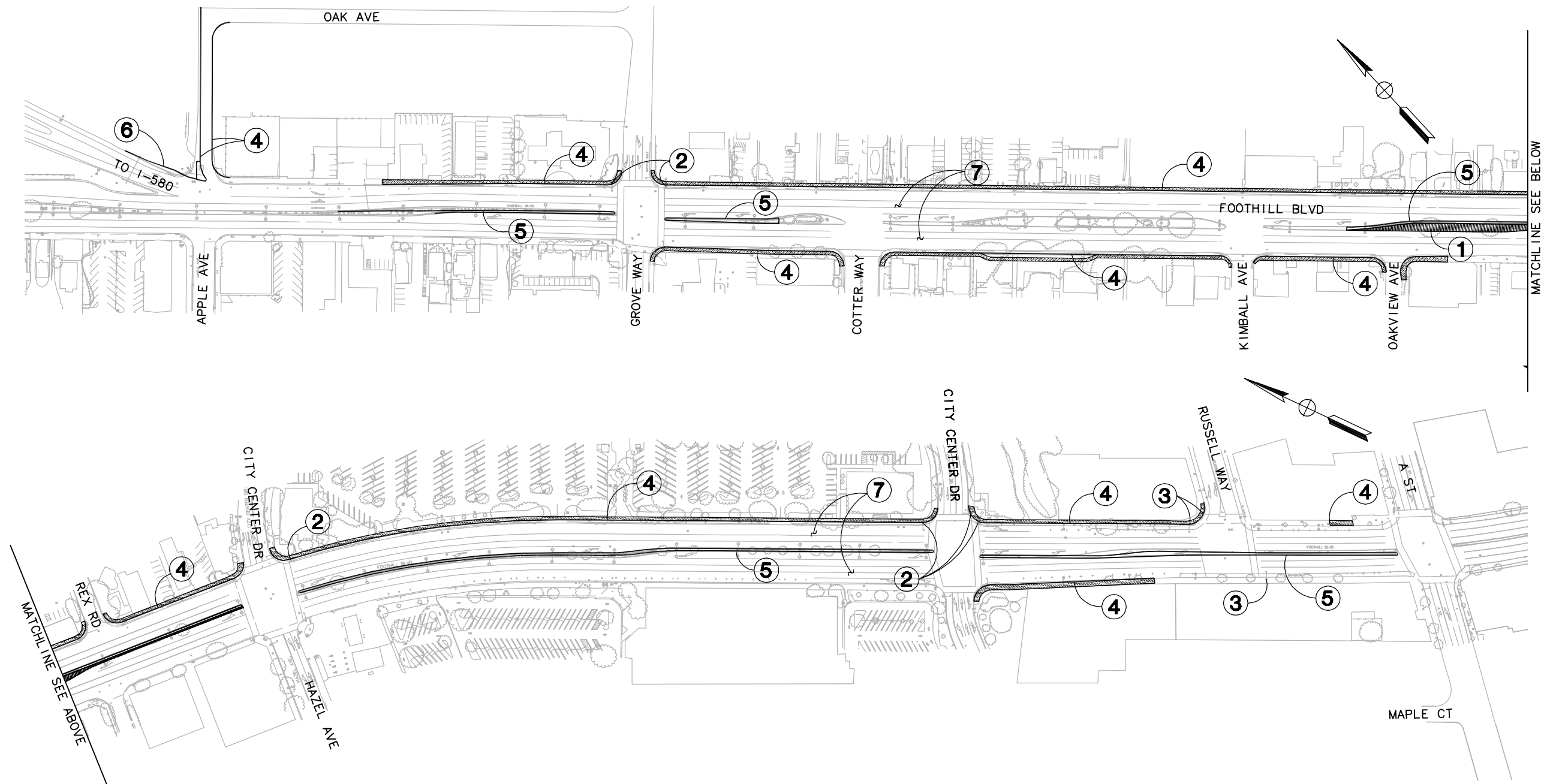


ROUTE 238  
CORRIDOR IMPROVEMENT PROJECT  
PRELIMINARY CONSTRUCTION STAGING PLANS

 **MARK THOMAS & COMPANY, INC.**  
Providing Engineering, Surveying, and Planning Services  
1960 ZANKER ROAD  
SAN JOSE, CA 95112 (408) 453-5373

JOB NO. 55-0326B  
DATE 8/22/07

SCALE 1"=100'  
SHEET 1 OF 9



### CONSTRUCTION




- ① REMOVE MEDIAN AND CONSTRUCT PAVEMENT.
- ② MODIFY TRAFFIC SIGNAL.
- ③ REMOVE TRAFFIC SIGNAL POLES.
- ④ REMOVE CURB AND SIDEWALK (IF EXISTING) AND CONSTRUCT NEW CURB AND SIDEWALK, STREET LIGHTING, AND STREET TREES; WIDEN PAVEMENT.
- ⑤ CONSTRUCT NEW MEDIAN, INCLUDING LANDSCAPING.
- ⑥ IMPROVE FOOTHILL/ROUTE 580 RAMP SPLIT.
- ⑦ PLACE FINAL ASPHALT OVERLAY OR SLURRY SEAL.

**Duration: 6 Months**

### TRAFFIC

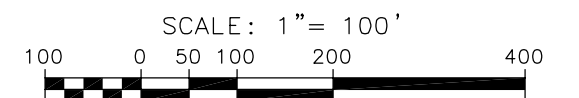
- A** ALL CONSTRUCTION WORK IN THIS STAGE TO BE CARRIED OUT USING TEMPORARY LANE CLOSURES.
- B** REMOVE PARKING AND PLACE STRIPING.

### LEGEND

-  CONSTRUCT PAVEMENT THIS STAGE
-  CONSTRUCT SIDEWALK THIS STAGE
-  CONSTRUCT THIS STAGE

### CHRONOLOGICAL WORK SEQUENCE:

- A** ① ② ③ ④ ⑤ ⑥ ⑦ ⑧ **B**



## ROUTE 238 CORRIDOR IMPROVEMENT PROJECT STAGE 1 - FOOTHILL BLVD (APPLE AVE to A ST)

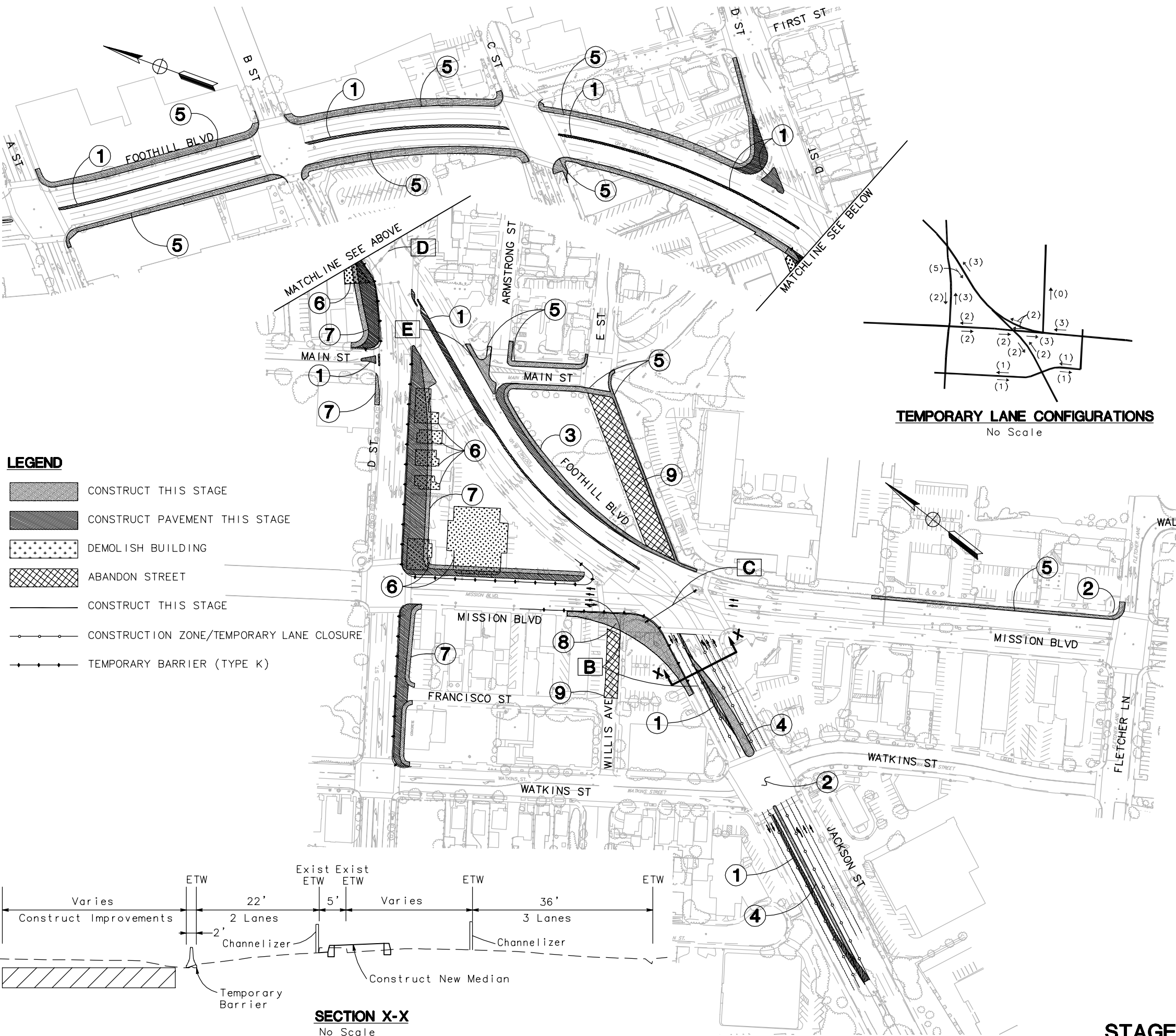


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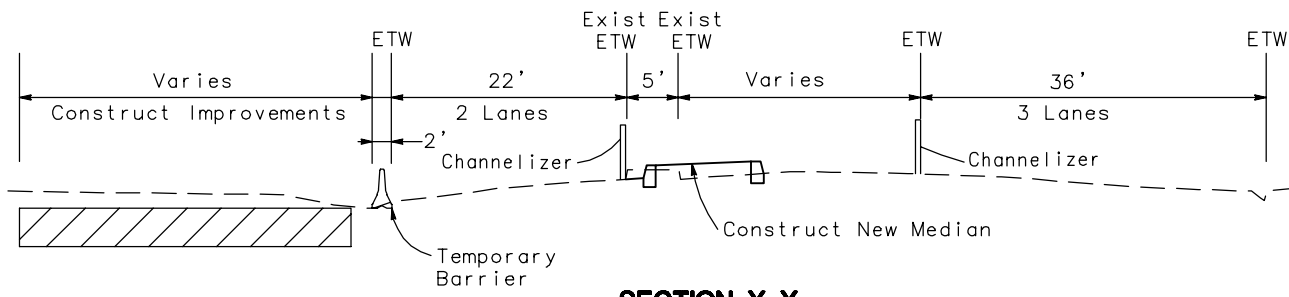
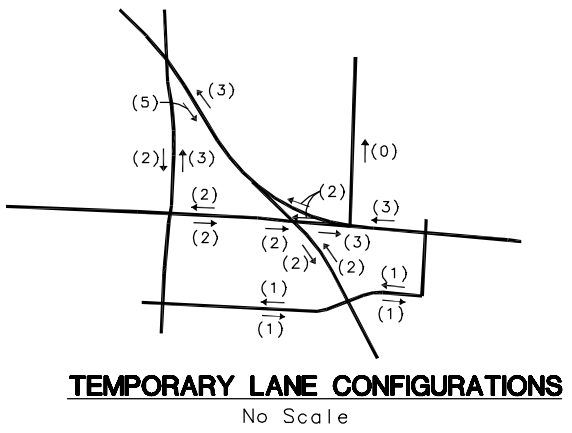
JOB NO. 55-0326B  
DATE 8/22/07

SCALE 1"=100'  
SHEET 2 OF 9

**STAGE 1**



- LEGEND**
- CONSTRUCT THIS STAGE
  - CONSTRUCT PAVEMENT THIS STAGE
  - DEMOLISH BUILDING
  - ABANDON STREET
  - CONSTRUCT THIS STAGE
  - CONSTRUCTION ZONE/TEMPORARY LANE CLOSURE
  - TEMPORARY BARRIER (TYPE K)



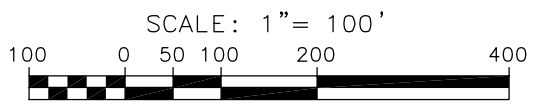
- CONSTRUCTION**
- 1 REMOVE MEDIAN & CONSTRUCT PAVEMENT.
  - 2 MODIFY TRAFFIC SIGNAL.
  - 3 REMOVE CURB AND SIDEWALK (IF EXISTING) AND CONSTRUCT NEW CURB AND SIDEWALK, STREET LIGHTING, AND STREET TREES; WIDEN PAVEMENT.
  - 4 CONSTRUCT NEW MEDIAN, INCLUDING LANDSCAPING.
  - 5 REMOVE CURB AND SIDEWALK (IF EXISTING) AND CONSTRUCT NEW CURB AND SIDEWALK, STREET LIGHTING, AND STREET TREES; REDUCE PAVEMENT.
  - 6 DEMOLISH BUILDINGS.
  - 7 WIDEN D STREET TO ULTIMATE WIDTH INCLUDING SIDEWALKS AND STREET LIGHTING (EXCLUDING MEDIAN IMPROVEMENTS). MAINTAIN EXISTING SIGNALS WHERE POSSIBLE AND INSTALL TEMPORARY SIGNALS WHERE NOT.
  - 8 WIDEN MISSION/JACKSON INTERSECTION (EXCLUDING SIDEWALK) AND IMPROVE KRAGEN PARKING LOT.
  - 9 ABANDON STREET.

- TRAFFIC**
- A CONSTRUCTION WORK IN THIS STAGE TO BE CARRIED OUT USING TEMPORARY LANE CLOSURES AS NECESSARY WHEN WHEN AREA IS NOT PROTECTED BY TEMPORARY CONCRETE BARRIER.
  - B MAINTAIN EXIST MISSION, D ST, FOOTHILL AND JACKSON TRAFFIC.
  - C MAINTAIN EXIST FOOTHILL/MISSION/JACKSON SIGNAL IN OPERATION DURING CONSTRUCTION IN THIS STAGE.
  - D MAINTAIN EXIST D ST SIGNAL IN OPERATION DURING WIDENING AND CONSTRUCT NEW SIGNAL. AFTER WIDENING IS COMPLETE, ACTIVATE NEW SIGNAL AND DEMOLISH EXIST SIGNAL.
  - E CLOSE NB MAIN ST AT FOOTHILL BLVD.
  - F REMOVE PARKING AND PLACE STRIPING WHERE SHOWN ON LAYOUT SHEETS.
  - G SHIFT D ST TRAFFIC ONTO NEWLY CONSTRUCTED PAVEMENT.

**CHRONOLOGICAL WORK SEQUENCE:**

A B C D 1 2 3 4 5 6 7 E F G 8 9

**Duration: 4 Months**



**ROUTE 238**

**CORRIDOR IMPROVEMENT PROJECT**

**STAGE 2 - FOOTHILL BLVD**

**(A ST to FLETCHER LN)**

**MARK THOMAS & COMPANY, INC.**

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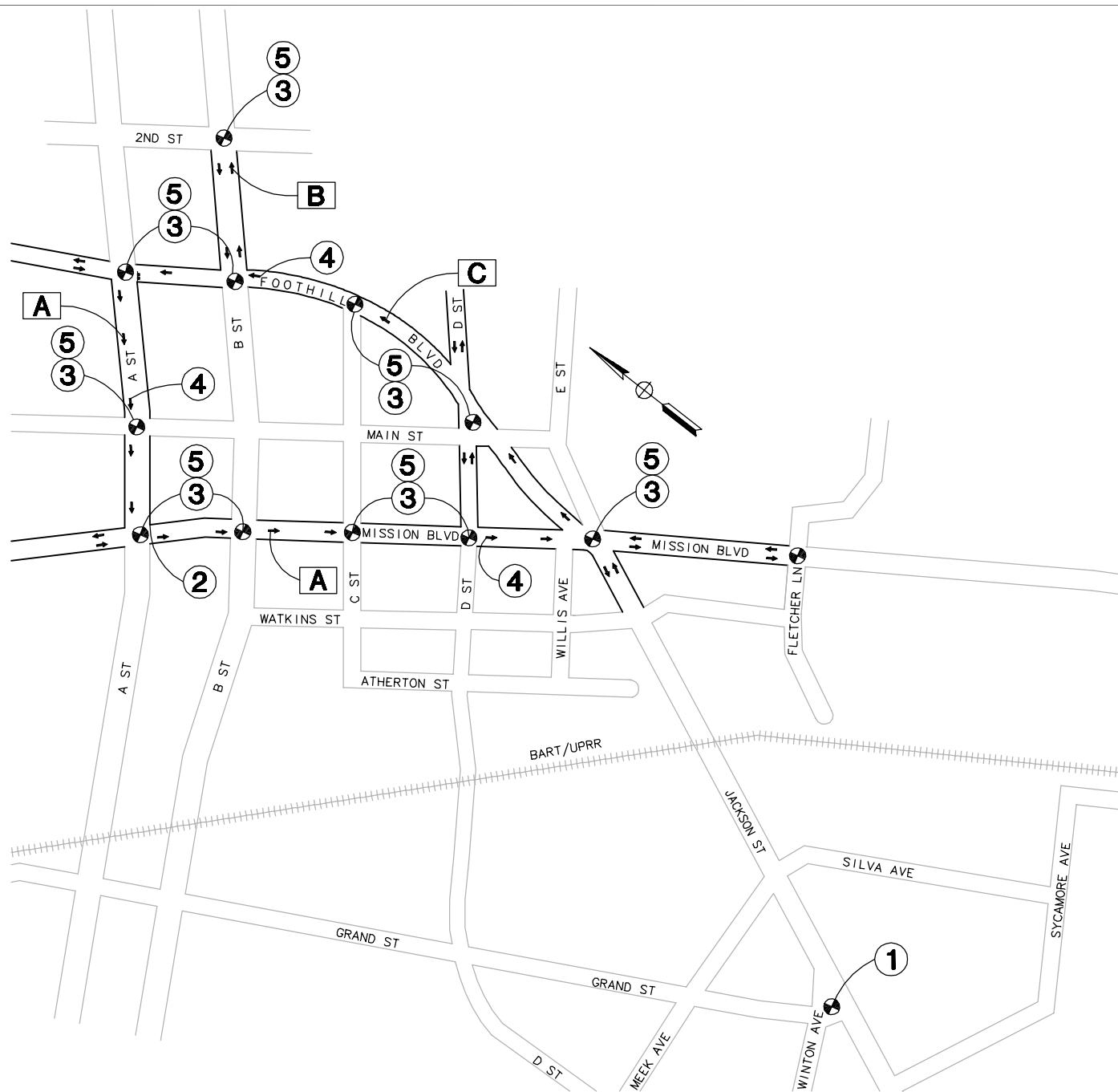
JOB NO. 55-0326B

DATE 8/22/07

SCALE 1"=100'

SHEET 3 OF 9

**STAGE 2A**



## STAGE 2B IMPLEMENT LOOP SYSTEM

### CONSTRUCTION

- ① IMPROVE JACKSON/GRAND/WINTON INTERSECTION (SEE DETAIL B).
- ② WIDEN MISSION BLVD/A ST INTERSECTION.
- ③ CONSTRUCT NEW SIGNAL WHILE MAINTAINING THE EXISTING ONE IN OPERATION. CONSTRUCT TEMPORARY SIGNALS WHERE NECESSARY.
- ④ STRIPE MISSION FOR 5 LANES SB; STRIPE A STREET FOR 5 LANES WB; STRIPE FOOTHILL FOR ONE WAY NB.
- ⑤ ACTIVATE NEW SIGNALS AND BEGIN ONE-WAY LOOP SYSTEM AND REMOVE EXISTING SIGNALS.

### CHRONOLOGICAL WORK SEQUENCE:

① ② ③ A B C ④ ⑤

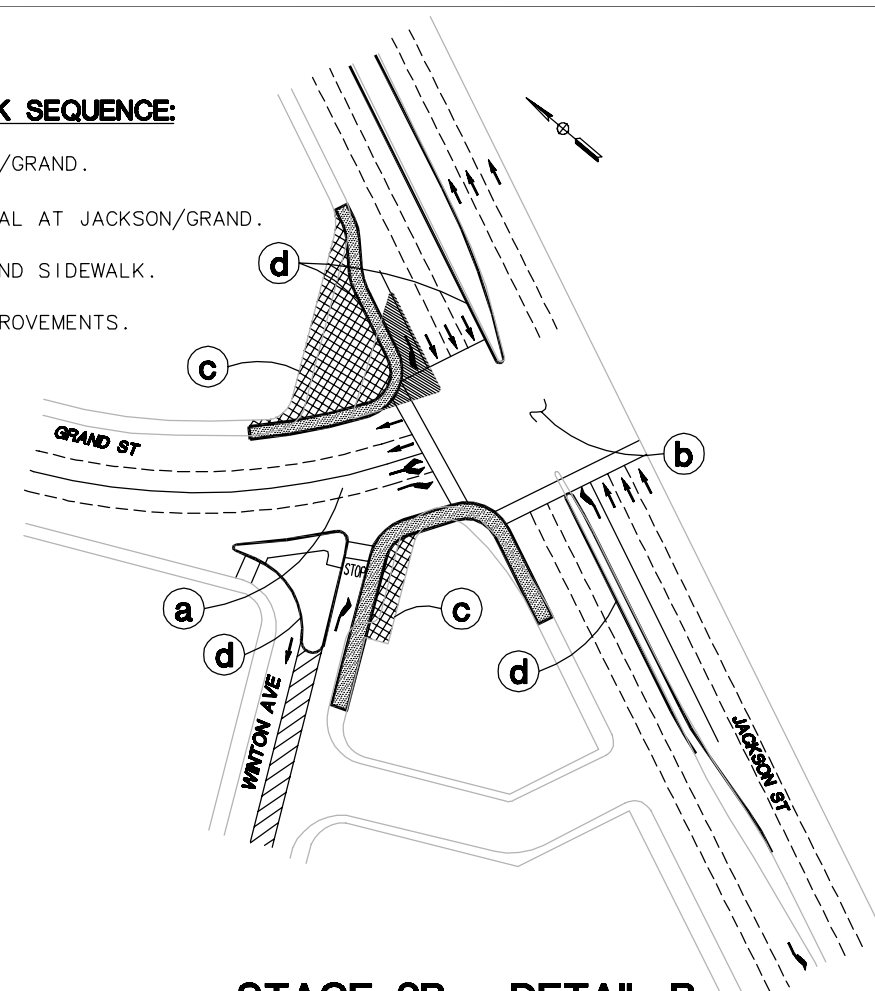
### TRAFFIC

- A CLOSE NB MISSION FROM JACKSON ST TO A STREET.
- B CONVERT B STREET FROM ONE-WAY TO TWO-WAY.
- C CLOSE SB FOOTHILL SOUTH OF A STREET.

**Duration: 5 Months**

### CHRONOLOGICAL WORK SEQUENCE:

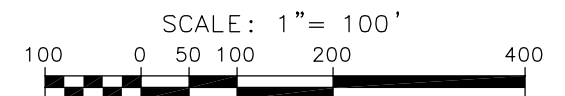
- a REMOVE SIGNAL AT WINTON/GRAND.
- b REMOVE AND REPLACE SIGNAL AT JACKSON/GRAND.
- c REMOVE EXIST PAVEMENT AND SIDEWALK.
- d CONSTRUCT REMAINING IMPROVEMENTS.



## STAGE 2B - DETAIL B JACKSON/GRAND/WINTON IMPROVEMENTS

### LEGEND

- CONSTRUCT THIS STAGE
- CONSTRUCT PAVEMENT THIS STAGE
- DEMOLISH BUILDING
- ABANDON STREET
- CONSTRUCT THIS STAGE
- CONSTRUCTION ZONE/LANE CLOSURE
- TEMPORARY BARRIER (TYPE K)
- NEW SIGNAL AND/OR SIGNAL MODIFICATION



## ROUTE 238 CORRIDOR IMPROVEMENT PROJECT STAGE 2B - IMPLEMENT LOOP SYSTEM



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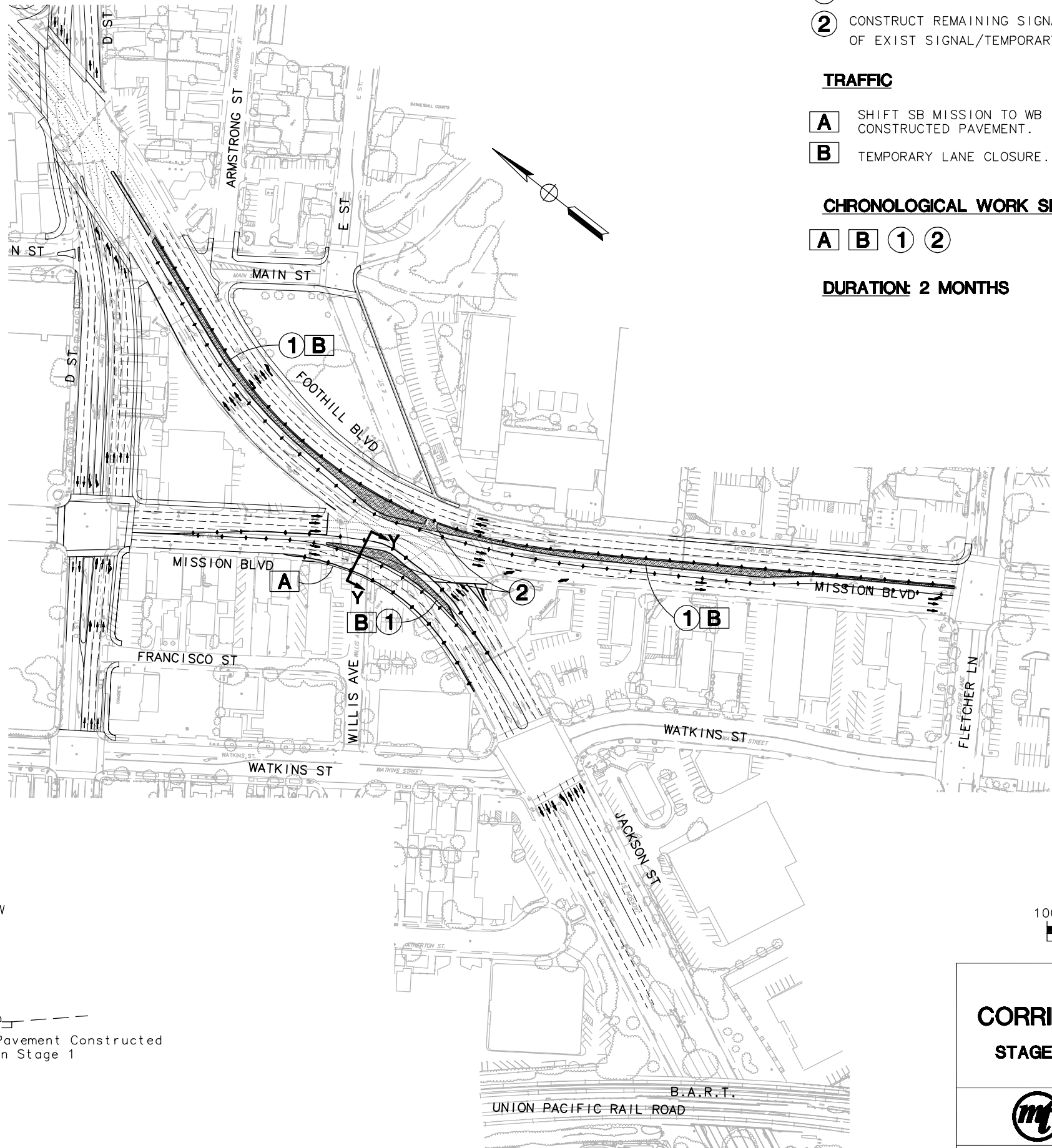
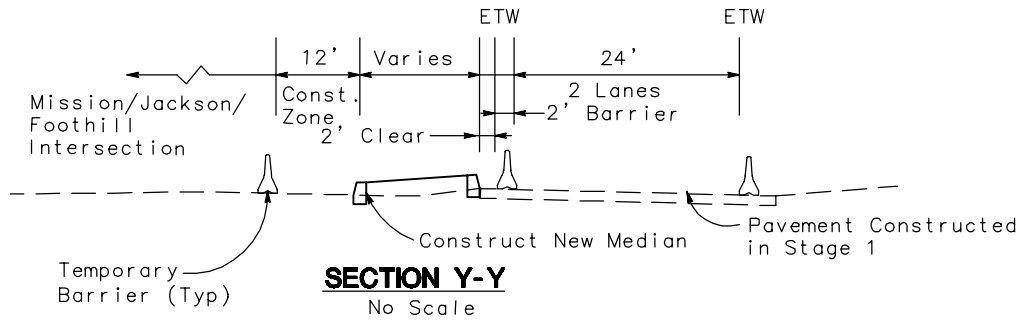
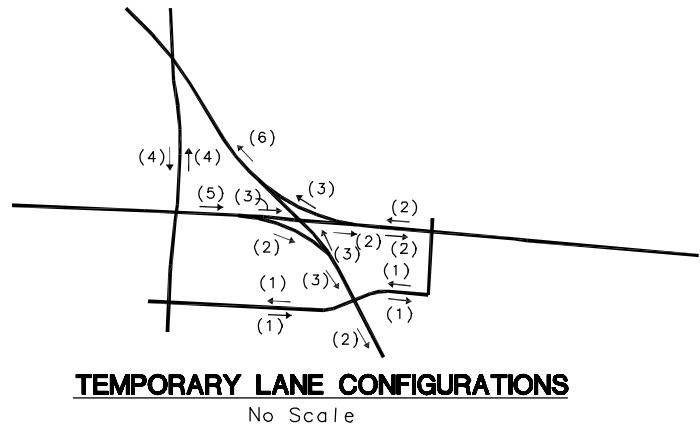
JOB NO. 55-0326B  
DATE 8/22/07

SCALE 1"=100'  
SHEET 4 OF 9

STAGE 2B



- LEGEND**
- CONSTRUCT THIS STAGE
  - CONSTRUCT PAVEMENT THIS STAGE
  - CONSTRUCT THIS STAGE
  - CONSTRUCTION ZONE/LANE CLOSURE



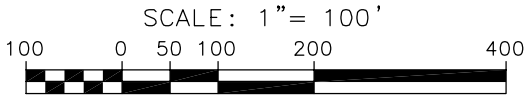
- CONSTRUCTION**
- 1 CONSTRUCT MEDIAN.
  - 2 CONSTRUCT REMAINING SIGNALS AND COMPLETE REMOVAL OF EXIST SIGNAL/TEMPORARY SIGNAL.

- TRAFFIC**
- A SHIFT SB MISSION TO WB JACKSON MOVEMENT WESTERLY ONTO NEWLY CONSTRUCTED PAVEMENT.
  - B TEMPORARY LANE CLOSURE.

**CHRONOLOGICAL WORK SEQUENCE:**

A B 1 2

**DURATION: 2 MONTHS**



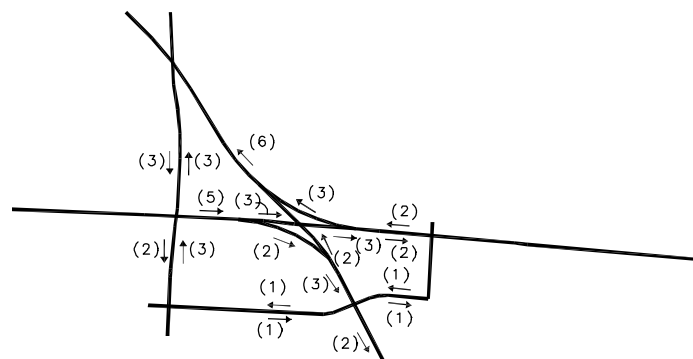
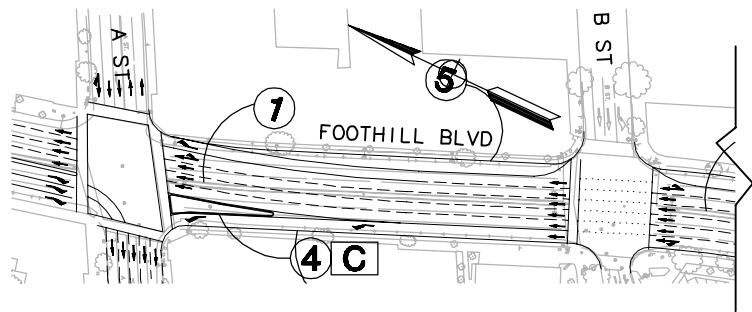
**ROUTE 238**  
**CORRIDOR IMPROVEMENT PROJECT**  
**STAGE 2C - Mission/Foothill/Jackson Intersection**

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SAN JOSE, CA 95112 (408) 453-5373

JOB NO. 55-0326B  
DATE 8/22/07  
SCALE 1"=100'  
SHEET 5 OF 9

**STAGE 2C**



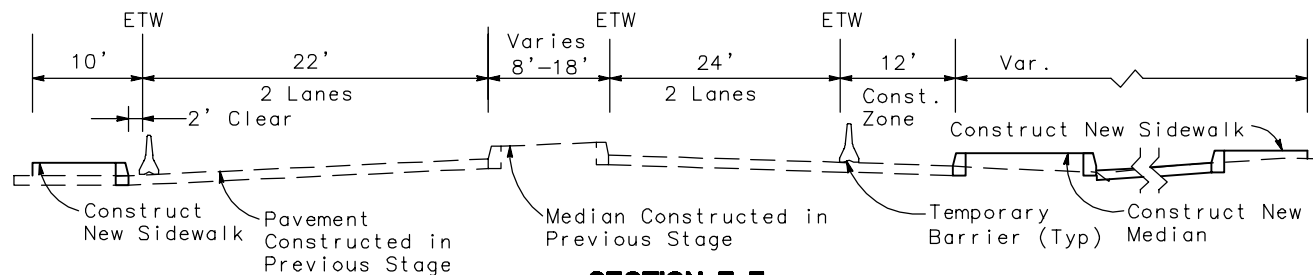


**TEMPORARY LANE CONFIGURATIONS**

No Scale

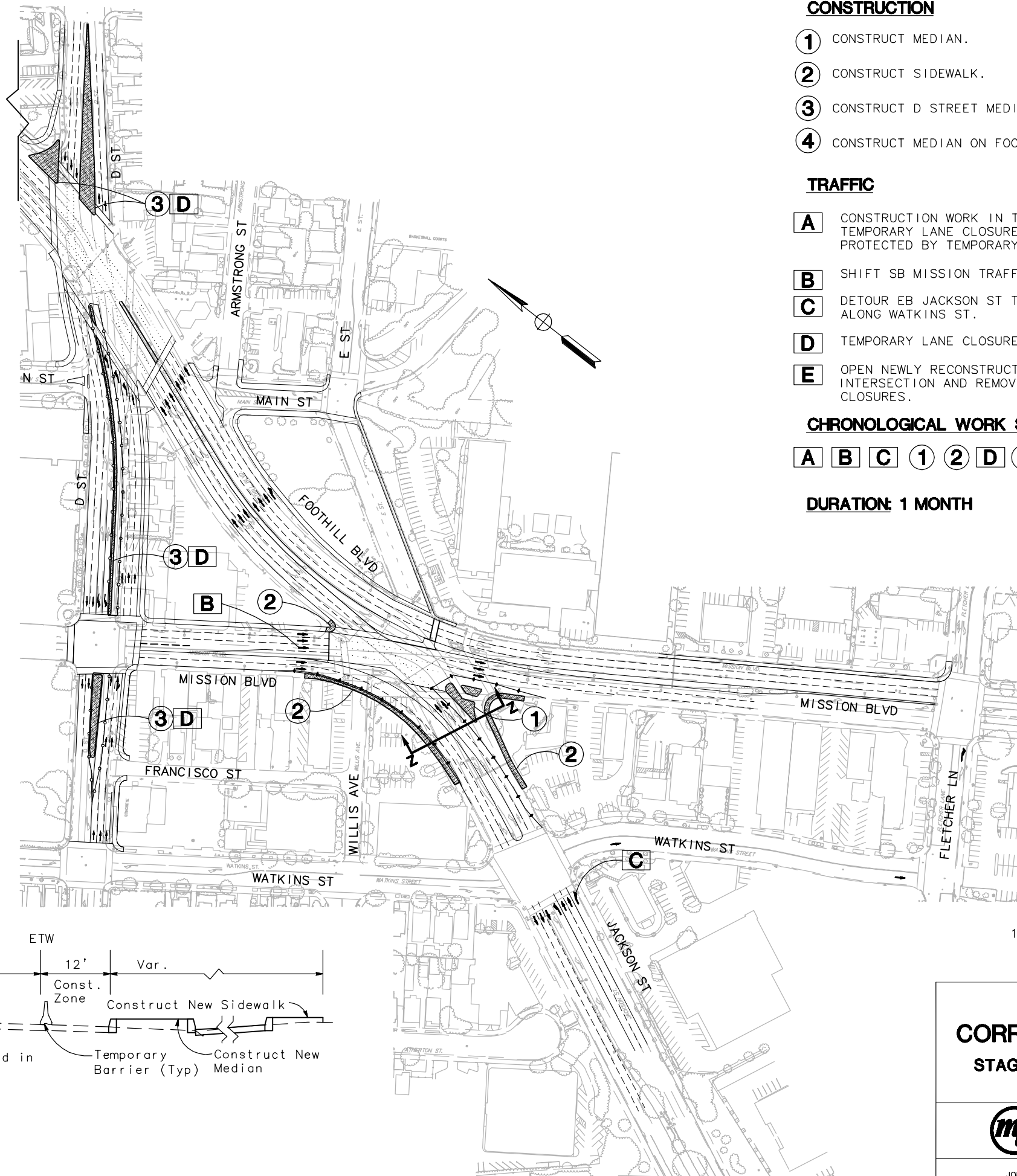
**LEGEND**

- CONSTRUCT THIS STAGE
- CONSTRUCT PAVEMENT THIS STAGE
- CONSTRUCT THIS STAGE
- CONSTRUCTION ZONE/LANE CLOSURE
- TEMPORARY BARRIER (TYPE K)



**SECTION Z-Z**

No Scale



**CONSTRUCTION**

- 1** CONSTRUCT MEDIAN.
- 2** CONSTRUCT SIDEWALK.
- 3** CONSTRUCT D STREET MEDIAN.
- 4** CONSTRUCT MEDIAN ON FOOTHILL BOULEVARD AT A STREET.

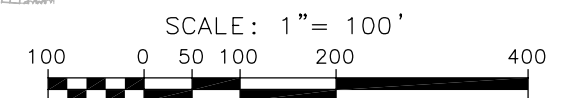
**TRAFFIC**

- A** CONSTRUCTION WORK IN THIS STAGE TO BE CARRIED OUT USING TEMPORARY LANE CLOSURES AS NECESSARY WHEN AREA IS NOT PROTECTED BY TEMPORARY CONCRETE BARRIER.
- B** SHIFT SB MISSION TRAFFIC EASTERLY (PROVIDE 3 THRU LANES).
- C** DETOUR EB JACKSON ST TO SB MISSION BLVD RIGHT TURN MOVEMENT ALONG WATKINS ST.
- D** TEMPORARY LANE CLOSURES FOR MEDIAN CONSTRUCTION.
- E** OPEN NEWLY RECONSTRUCTED MISSION/JACKSON/FOOTHILL INTERSECTION AND REMOVE ALL TEMPORARY DETOURS AND LANE CLOSURES.

**CHRONOLOGICAL WORK SEQUENCE:**

**A B C 1 2 D 3 4 E**

**DURATION: 1 MONTH**



**ROUTE 238  
CORRIDOR IMPROVEMENT PROJECT  
STAGE 2D - Mission/Foothill/Jackson Intersection**

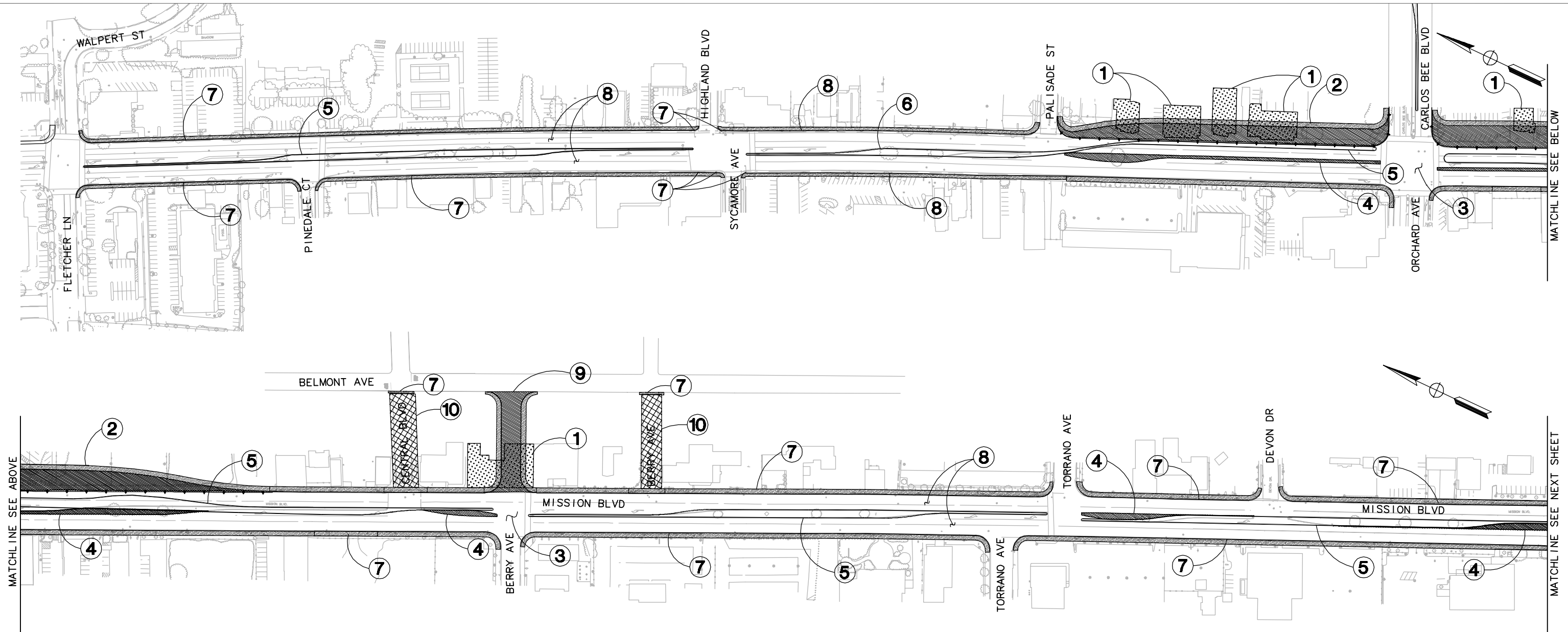


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SAN JOSE, CA 95112 (408) 453-5373

JOB NO. 55-0326B  
DATE 8/22/07

SCALE 1"=100'  
SHEET 6 OF 9

**STAGE 2D**



**CONSTRUCTION**

- 1 DEMOLISH BUILDINGS.
- 2 WIDEN MISSION BOULEVARD TO ULTIMATE WIDTH INCLUDING SIDEWALKS, STREET TREES, AND STREET LIGHTS.
- 3 INSTALL NEW SIGNALS.
- 4 REMOVE MEDIAN AND CONSTRUCT PAVEMENT; ACTIVATE NEW SIGNALS.
- 5 CONSTRUCT NEW MEDIAN, INCLUDING LANDSCAPING.
- 6 MODIFY TRAFFIC SIGNAL.
- 7 REMOVE CURB AND SIDEWALK (IF EXISTING) AND CONSTRUCT NEW CURB AND SIDEWALK, STREET LIGHTING, AND STREET TREES.
- 8 PLACE FINAL ASPHALT OVERLAY.
- 9 CONSTRUCT NEW PAVEMENT & SIDEWALK.
- 10 ABANDON STREET.

**TRAFFIC**

- A CONSTRUCTION WORK IN THIS STAGE TO BE CARRIED OUT USING TEMPORARY LANE CLOSURES AS NECESSARY WHEN WHEN AREA IS NOT PROTECTED BY TEMPORARY CONCRETE BARRIER.
- B WIDEN MISSION BOULEVARD; MAINTAIN EXISTING TRAFFIC PATTERN USING EXISTING SIGNALS & TEMPORARY SIGNALS WHERE NEEDED.
- C PLACE STRIPING WHERE SHOWN ON LAYOUT SHEETS.
- D SHIFT NB MISSION TRAFFIC ONTO NEWLY CONSTRUCTED PAVEMENT

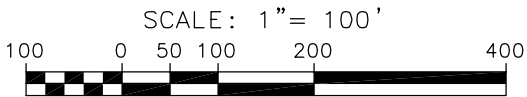
**LEGEND**

- CONSTRUCT PAVEMENT THIS STAGE
- ABANDON STREET
- DEMOLISH BUILDING
- CONSTRUCT THIS STAGE
- TEMPORARY BARRIER (TYPE K)

**CHRONOLOGICAL WORK SEQUENCE:**

A B 1 2 3 4 5 6 7 8 C D 10

**DURATION: 3 Months (Total Stage 3)**



**ROUTE 238  
CORRIDOR IMPROVEMENT PROJECT  
STAGE 3 - MISSION BLVD  
(FLETCHER LN to DEVON DR)**

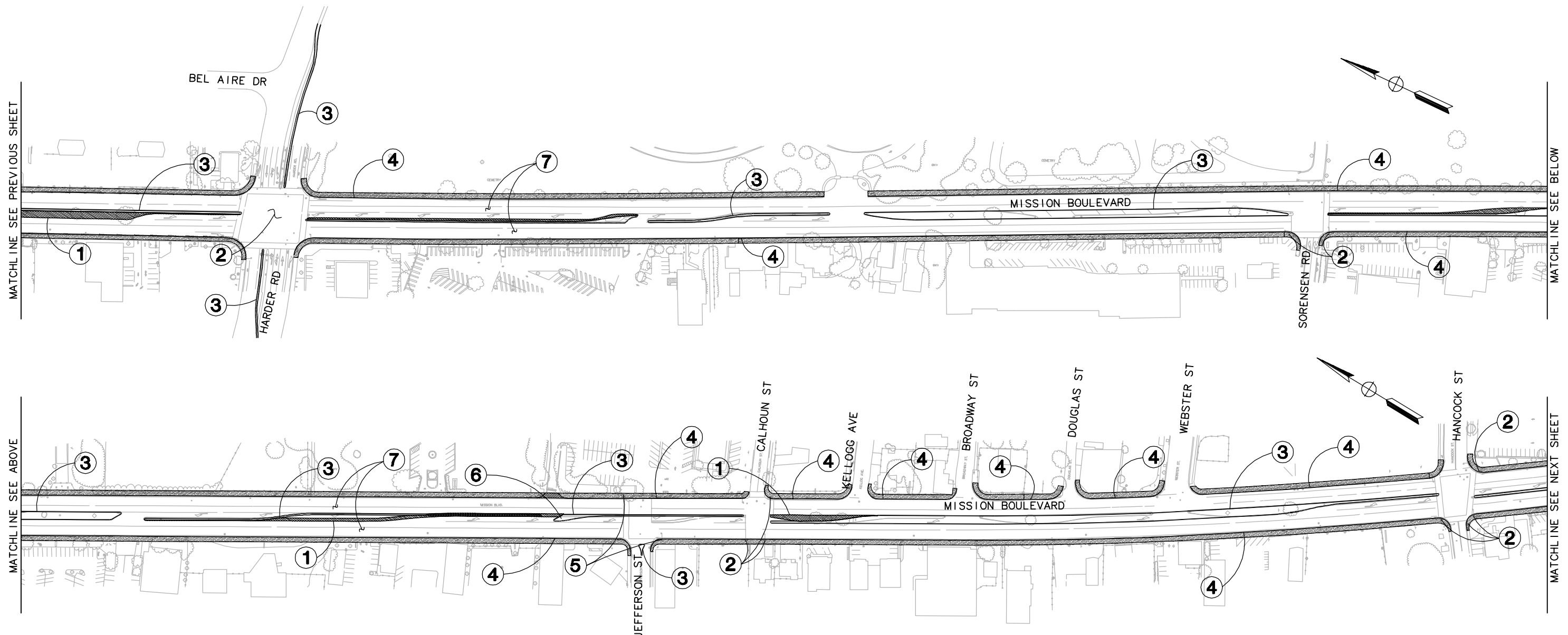


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JOB NO. 55-0326B  
DATE 8/22/07

SCALE 1"=100'  
SHEET 7 OF 9

**STAGE 3**






**CONSTRUCTION**

- ① REMOVE MEDIAN CURB AND CONSTRUCT PAVEMENT.
- ② MODIFY TRAFFIC SIGNAL.
- ③ CONSTRUCT NEW MEDIAN, INCLUDING LANDSCAPING.
- ④ REMOVE CURB AND SIDEWALK (IF EXISTING) AND CONSTRUCT NEW CURB AND SIDEWALK, STREET LIGHTING, AND STREET TREES.
- ⑤ REMOVE EXISTING SIGNALS.
- ⑥ INSTALL NEW SIGNALS.
- ⑦ PLACE FINAL ASPHALT OVERLAY.

**TRAFFIC**

- A** ALL CONSTRUCTION WORK IN THIS STAGE TO BE CARRIED OUT USING TEMPORARY LANE CLOSURES.
- B** PLACE STRIPING WHERE SHOWN ON LAYOUT SHEETS.

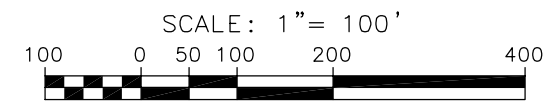
**LEGEND**

-  CONSTRUCT THIS STAGE
-  CONSTRUCT PAVEMENT THIS STAGE
-  CONSTRUCT THIS STAGE


**CHRONOLOGICAL WORK SEQUENCE:**

- A** ① ② ③ ④ ⑤ ⑥ ⑦ **B**

**DURATION:** 3 Months (Total Stage 3)



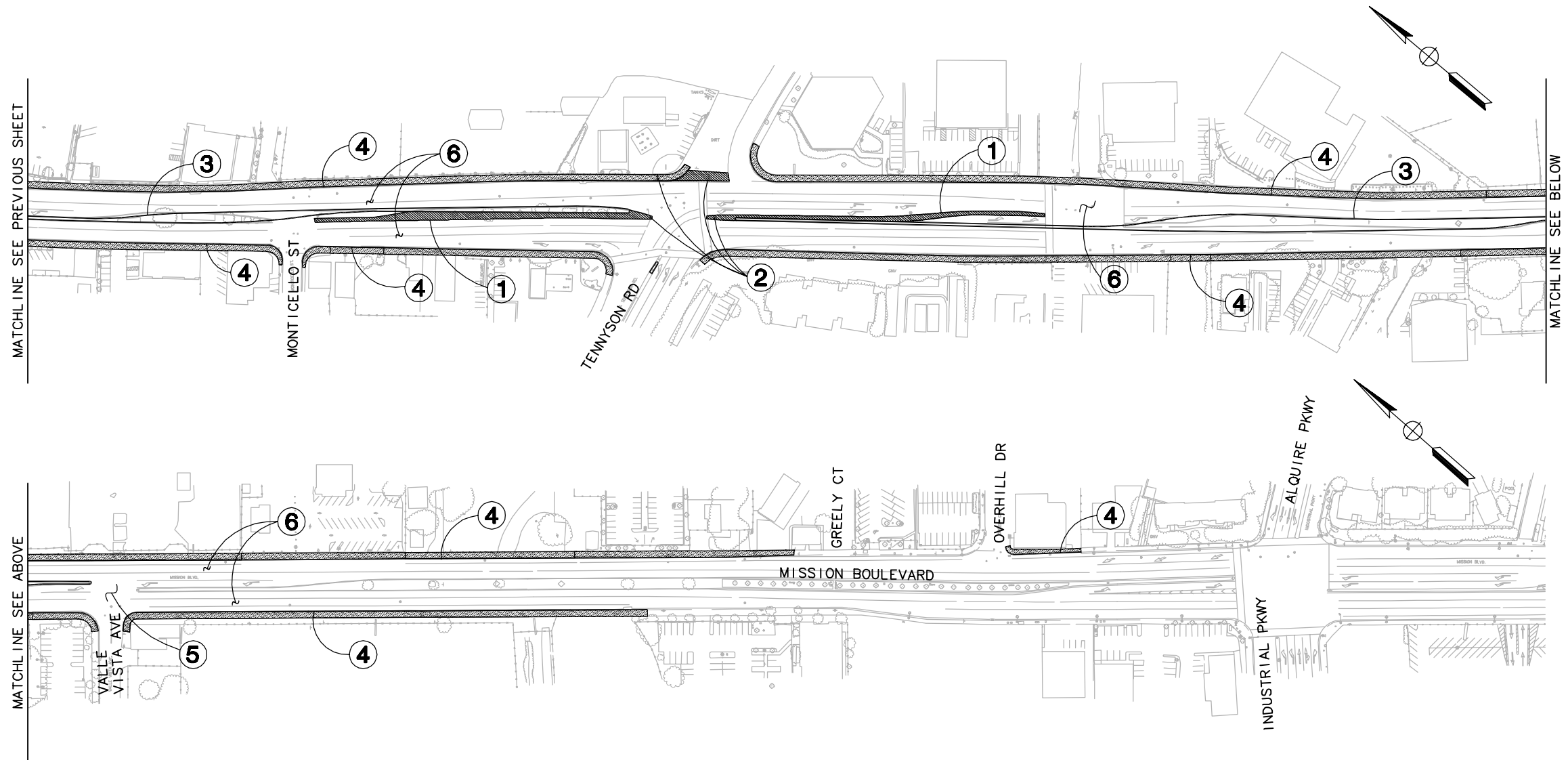
**ROUTE 238**  
**CORRIDOR IMPROVEMENT PROJECT**  
**STAGE 3 CONT'D - MISSION BLVD**  
**(HARDER RD to HANCOCK ST)**



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JOB NO. 55-0326B      SCALE 1"=100'  
DATE 8/22/07      SHEET 8 OF 9

**STAGE 3 (CONT'D)**



**CONSTRUCTION**

- ① REMOVE MEDIAN CURB AND CONSTRUCT PAVEMENT.
- ② MODIFY TRAFFIC SIGNAL.
- ③ CONSTRUCT NEW MEDIAN, INCLUDING LANDSCAPING.
- ④ REMOVE CURB AND SIDEWALK (IF EXISTING) AND CONSTRUCT NEW CURB AND SIDEWALK, STREET LIGHTING, AND STREET TREES.
- ⑤ INSTALL NEW SIGNALS.
- ⑥ PLACE FINAL ASPHALT OVERLAY.

**TRAFFIC**

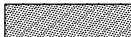



- A** ALL CONSTRUCTION WORK IN THIS STAGE TO BE CARRIED OUT USING TEMPORARY LANE CLOSURES.
- B** PLACE STRIPING WHERE SHOWN ON LAYOUT SHEETS.

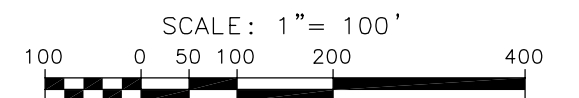
**CHRONOLOGICAL WORK SEQUENCE:**

**A** ① ② ③ ④ ⑤ ⑥ **B**

**DURATION:** 3 Months (Total Stage 3)

**LEGEND**

-  CONSTRUCT THIS STAGE
-  CONSTRUCT PAVEMENT THIS STAGE
-  CONSTRUCT THIS STAGE
-  TEMPORARY BARRIER (TYPE K)



**ROUTE 238  
CORRIDOR IMPROVEMENT PROJECT  
STAGE 3 CONT'D - MISSION BLVD  
(MONTICELLO ST to INDUSTRIAL PKWY)**



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JOB NO. 55-0326B  
DATE 8/22/07

SCALE 1"=100'  
SHEET 9 OF 9

**STAGE 3 (CONT'D)**